BUILDER

THE WORLD'S GREATEST BUILDING PAPER

MARCH 1954

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'How to do it'
Roundup

Here's why NUTONE started a



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NO DANGER OF SHOCKS — OR BURNS . . . because NuTone Heat-A-Lite is built into the CEILING . out of horm's reach — children can't pake lingers or toys into element . . . No danger at overheating Underwriters Laboratories listed.

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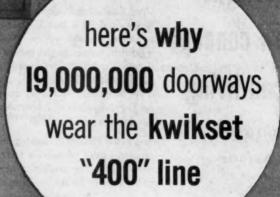
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For further information on the "Freedom" and its variations, plus local promotion plans, send the coupon today! You will find the American way to greater sales is the profitable way for you!



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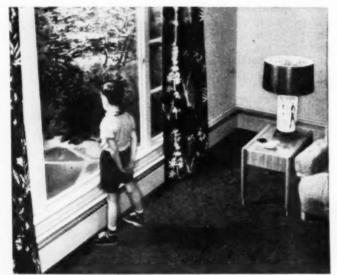
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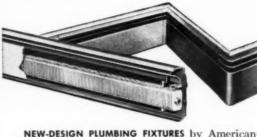
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PRODUCT NEWS from AMERICAN-Standard

A review of products in the news and important features worth remembering

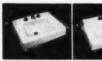


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For further information on American-Standard products see Sweet's Light Construction File.

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Is this a

NEW MARKET?

A SUPERHIGHWAY with four-leaf clover intersections is scheduled for projection this spring through an old section of Toledo, Ohio. The project required condemnation of about 200 land parcels, most of them accommodating houses ranging in age from 30 to 60 years. After settlement with the owners, the State offered the houses to the highest bidders. There were purchasers. Among them were Paul Fuller and George Schuster, local builders and realtors. They had purchased about 20 of the houses up to January 30, selecting only those which they deemed restorable.

At the same time they purchased improved lots on a wide street near the edge of the city. Each house was jacked from its old foundation, wires along the path of movement (about two miles) were raised for clearance where necessary, and the houses moved to new concrete block foundations. New heating, plumbing, wiring and porches were installed. Once settled on their new foundations, the old houses were re-sided where and when necessary, painted and reroofed. All have three to four bedrooms, one to one- and one-half baths and new kitchens. They are selling for an average of \$11.500. They provide completely refurbished adequate housing with an estimated effective life of another 50 years for large families with low incomes.

Fuller and Schuster, making the natural mistakes of pioneers, netted much less than the time and hazards entitled them to. But they did create what, as far as we know, is the first housing development of used houses. And in doing it they raise a question that builders, the FHA and the VA in countless other parts of the country will have to answer with increasing regularity in the next decade as more of these highways develop, and as slum redevelopment activity increases. The question for the builders is: Can the lessons of Fuller and Schuster be applied profitably toward conservation and sale of similar properties? The question for FHA and VA is how to apply standards for such operations so that young, large and low income families can be given adequate space at a price they can afford, and with the advantages of FHA and VA financing.

We believe that the Fuller and Schuster operation is worth close study by housing authorities from both social and economic viewpoints; and we recommend that FHA and VA examine every detail of the operation.

In Chicago a similar highway development on the far northwest side resulted in making purchase of the house open to the owner after condemnation. Experience to date indicates that the owner can purchase a new lot, move and refurbish the house and come out even, or money ahead. In these cases the old houses are being spotted on scattered lots.

Both the Chicago and Toledo operations open a new field of housing activity worth further investigation,

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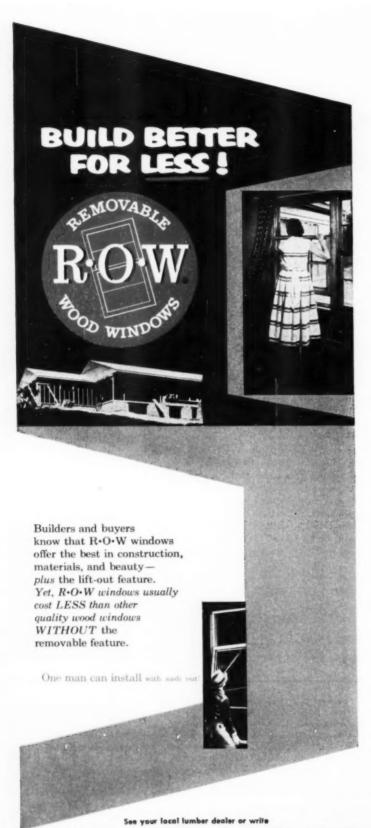
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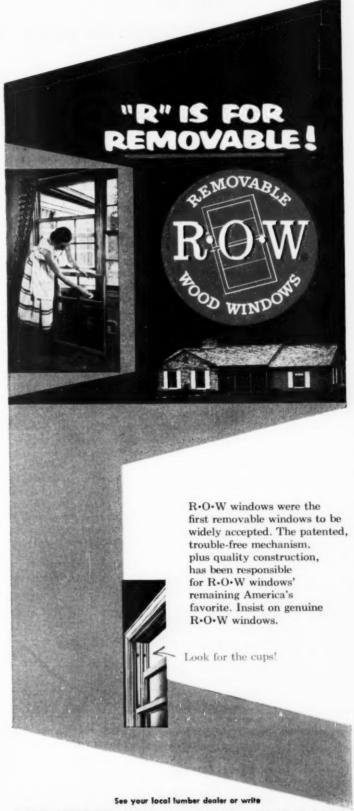
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expect increase in home building this year

A survey just completed by American Builder indicates that about 70 per cent of the builders expect to construct more dwelling units in 1954 than they did in 1953. Final results of the survey showed home building this year is likely to exceed '53 by about 10 per cent.

Besides building new houses, the builders surveyed also are engaged in the construction of commercial. institutional and farm buildings. and in remodeling existing dwellings and non-residential structures. They foresee good business in these categories in '54. The result should be brisk business for lumber dealers and producers of building materials. Sales may well be above those of 1953 when more than one million new dwellings were built, as well as tens of thousands of commercial, institutional and farm buildings, plus a substantial amount of remodeling.

A factor that will facilitate the construction of new homes is an anticipated increase in the supply of mortgage money. During the last half of 1953, a shortage of mortgage money caused housing starts to drop slightly from the high levels of 1952. Even with a tight mortgage market, current expenditures for new housing have been at the remarkable rate of \$1 billion monthly.

New Government Plans

Although the volume of home construction is running at a satisfactory rate on its own momentum, the housing program recently announced by the housing industry and the federal government carries forward the idea that more Americans should have the opportunity to become home owners.

It is hoped the program will bring home ownership within the reach of the lower income groups by providing 40-year mortgages on low-priced houses. This is proposed as an alternative to public housing. However, the industry agrees that some public housing may be necessary for those who are reluctant to enter into 40-year mortgages.

Increase in Building Costs

The year 1953 marked the twen-

tieth year of constantly rising costs in the building industry, and it is difficult to sec any prospects of a downturn. The cost of new homes has kept pace with other commodities and services during this period.

A series of cost figures maintained by Roy Wenzlick and Company, real estate economists, on a standard six-room frame house built in St. Louis, show the cost to have been \$7,300 in 1943. In 1953 the cost was \$16,400, considerably more than double the 1943 figure.

A substantial part of this increase occurred between 1950 and 1953. During those three years the costs jumped from \$13,800 in 1950 to \$16,400 in 1953—an increase of almost 20 per cent.

Power Equipment Ownership

Few people realize that the building industry is now highly mechanized, compared with the handcraft methods-used thirty years ago. If this were not true, houses would cost as least 30 per cent more than they do, and home ownership would be denied a large segment of the American public.

Queried as to the type and amount of power equipment owned, the builders we surveyed revealed that:

The portable electric saw was the most popular power tool. The 1,093 builders who replied own a total of 2.854 such saws, and one out of

every four plans to buy new ones this year.

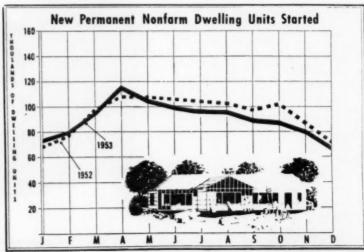
The builders reported owning 605 radial saws with plans to buy 130. They own 19 masonry saws and plan to buy 30 more. And they own 129 chain saws and will add 34 new ones to their stock this year.

Remodeling Activity High

Sixty-eight per cent of the builders queried are engaged in remodeling. One builder keeps three men busy on remodeling—another has over two hundred contracts for remodeling apartments.

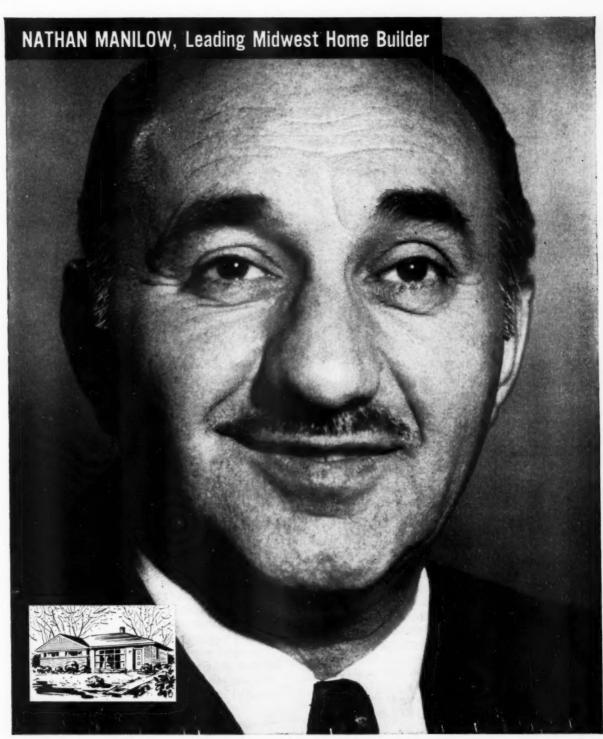
The United States Chamber of Commerce says that "the enormous size and the even greater potential size of the demand for residential repair, improvement and alteration are now well recognized. The probable current expenditure for this type of work is around \$6.6 billion, with the possibility of pushing the total 30 to 50 per cent higher."

Many communities are making intensive efforts to eliminate slum areas. As their plans materialize, the markets for materials and the demands for the services of builders from this quarter will increase. This activity, added to an anticipated increase in home building volume and the expansion of the fix-up market, contribute generally to the good business outlook for all concerned in 1954.



United States Bept, of Labor Burges of Labor Statistics

AMERICAN BUILDER CHART



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POST

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- LOCAL NEWS
- FORECASTS
- NEW TRENDS

NORTHERN area



NEAR-RECORD HOME PRODUCTION in 1954 is now being predicted freely throughout the North, due to:

- 1. Big crowds of homeseekers visiting new model homes.
- Steady improvement in the mortgage money market.
- 3. Prompt start of legislation in Congress (Feb. 12) to carry out President Eisenhower's housing program urging such incentives as lower down payments and longer terms.

Starts this year will increase 60,000 to 100,000, believes Rodney M. Lockwood of Detroit, member of the President's advisory committee on housing and former NAHB president.

Americans have been on a savings spree for three years, he said, and "it is about time for them to get on a spending spree." Aggressive selling will loosen up high individual savings, in his opinion.

At the start of the year, another 25,000-plus new homes were foreseen for the Detroit area. By the end of January, applications in the local FHA office were up 147 per cent.

MORE WORK ON DRAFTING BOARDS is the word from architects to Walter H.

Stackler, president, Long Island Home Builders Institute, who reports that it looks like another 40,000 units this year in his territory. Last year's output was cut 10 per cent to 36,000 homes by a nine-week teamster's strike.

St. Louis, beset by a similar strike for three months last year, expects to better its 1953 record of 10,000 new units.

The Chicago area, out to better its 40,000 mark of last year, listed 2,638 permits in January, nearly double the comparable 1953 figure.

TREND TO DUPLEX UNITS grew rapidly last year in Milwaukee, is expected to be stronger than ever this season,

and aid in assuring another 7,500-home year.

A 10 per cent rise to over 10,000 units looms in Pittsburgh, due to general business conditions and anticipation of broader FHA benefits, according to A. M. Rearick, president, HBA of Metropolitan Pittsburgh.

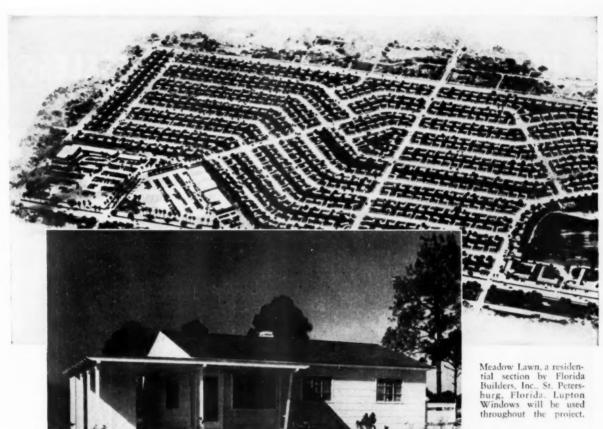
Rhode Island can look for 3,400 new homes this year, reports Anthony Viola, past president of the state association, particularly if Congress enacts the new housing program.

Rochester, N. Y., sees another banner year of 3,000 new homes. Alvah B. Lawson, president, Rochester Home Builders Association, says: "we have a steady town here, employment is good, no layoffs are in sight and the banks co-operate very well."

STRONG SUBURBAN TREND keeps housing going at its high pace, believes Herman Greenwood, Indianapolis realty man. It will continue for years to come, he said, explaining that families want real suburban life, not rural, with shopping, churches, schools, and other facilities handy.

ONE-YEAR GUARANTEE BOND is now given buyers by members of the New Jersey Home Builders Association. <u>Issued in the amount of \$2,000 for each house,</u> the bond protects buyer against defects in roof or basement construction, heating and septic tank installations.

PERMANENT PARADE OF HOMES opposite its Hamilton, Ohio plant pays dividends to Pease Woodwork Company, maker of prefabricated homes. Nine units ranging from 792 to 1,463 square feet are shown, with slab, crawl space or full basement construction. Over 100,000 persons visited the homes last year.



Easier installation . . . easier sales with Lupton Aluminum Casements

Houses in Meadow Lawn are small, neat, attractive and easy to care for. One good reason for reduced upkeep is the use of Lupton Aluminum Casements. Owners — and you — are free from the painting nuisance. Lupton Aluminum Casements will never need paint.

Appearance is appreciated, too. Neutral-tone Lupton Aluminum Casements, with trim, slim frames and muntins will blend with any color scheme. And, unaffected by weather, will keep their beauty.

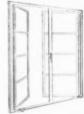
Here are windows that will always work smoothly, open easily, close snug and tight. Install Lupton Aluminum Casements in your houses. You'll gain increased good-will through customer satisfaction. You'll gain in time and labor costs, too. Precision-engineered, designed and developed with the skills gained through more than 40 years experience offer you one of the best buys on the market. Installation is simple, frames are light — it's a one-man job. Get full details today. Write for complete catalog.

MICHAEL FLYNN MANUFACTURING COMPANY 700 East Godfrey Avenue, Philadelphia 24, Pa.

LUPTON METAL WINDOWS



Lupton Aluminum Awning Window



Lupton Casement Steel or Aluminum

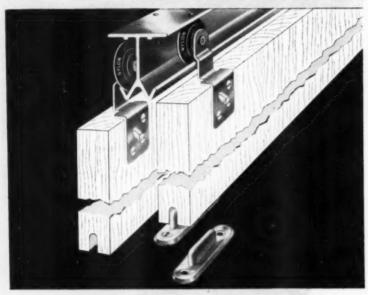


Lupton Aluminum Double Hung Window

HERE IT IS!



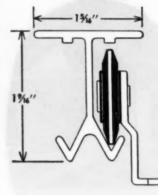
NOISELESS



NOISELESS, FREE-WHEELING TRACK AND WHEEL

This track and wheel are made for each other! See how the wheel rolls on the sides of the track-not the bottom! This not only centers the wheel, but keeps it riding above dust and lint that may accumulate in the groove. Rustproof aluminum track, plus the lifetime nylon wheel and solid brass wheel bearing, guarantees you quiet, smooth, trouble-free operation.

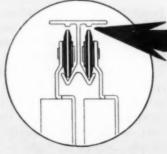
- ★ Extra-heavy extruded aluminum track
- ★ Heavy gauge Cadmium plated steel hangers with adjustable slot
- ★ Noiseless, Lifetime Nylon
- ★ Silent, Solid Brass Wheel Bearing
- ★ Positive, nojump track feature
- ★ Smoothest, quietest operating



ACTUAL SIZE TRACK OT200



Hanger enters track easily



Bumper ridge keeps wheel from jumfing track

Built-in Protection

AGAINST TRACK JUMPING!

At last—sliding door hardware with built-in, positive protection against track jumping! And there's no extra work, nothing for you to do—because this exclusive M-D design stops track jumping with a built-in bumper ridge that makes it impossible for the wheel to lift out of the track once the door is in place over the floor guide. It's simple, sure, foolproof!



Another Quality Product from MACKLANBURG-DUNCAN CO.

OKLAHOMA CITY, OKLAHOMA

Sliding Door HARDWARE



ATTENTION DEALERS!

STOCK-DISPLAY CASE & ACTUAL WORKING MODEL FREE WITH THIS ASSORTMENT!

TRACK

10 PIECES - 4' EACH

10 PIECES - 5' FACH

10 PIECES - 6' EACH

10 PIECES - 8' EACH

TOTAL TRACK - 230'

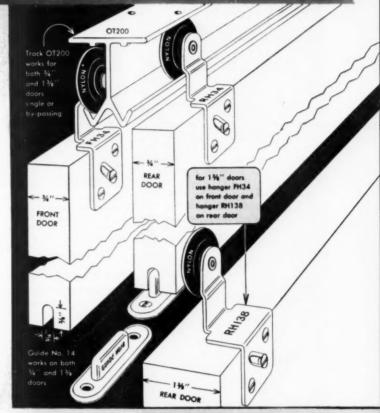
40 boxes of complete hardware for 3/4" doors.

10 boxes of complete hardware for 1 %" doors.

- * ATTRACTIVELY DISPLAYED
- **INCREASES IMPULSE PURCHASES**
- * TAKES SMALL SPACE

COMPLETE HARDWARE FOR DOORS %" TO %" OR DOORS 1" TO 1%"

Hardware comes completely packaged for a pair of 34" doors, or for a pair of 136" doors. Each package contains 2 front door hangers and screws, 2 rear door hangers and screws, 2 door guides and screws, as well as sufficient screws for mounting track. Cartons are clearly marked for 34" doors or for 136" doors.



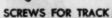






DOOR **GUIDES** AND **SCREWS**







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DEALERS

Order now! Your order will be shipped the same day it is received. Macklanburg-Duncan products are fast sellers, nationally advertised.



news

northern area



Dealer Conventions Stress Added Services to Fit Changing Customer Needs

In the future, retail dealers must give the customer improved service and discard obsolete merchandising and selling practices. D. B. Taylor, president of the Northwestern Lumbermens Association said in keynoting the 64th annual convention of the organization in Minneapolis in January. Contractors should not be given such large discounts, he warned that they make more on a bill than the dealer.

At the same time, Charles LeBlanc, Research Institute of America, warned dealers that they faced an era of tougher selling and must develop a strong sales approach to surmount the obstacles.

"Sell color, not just paint in cans," was the advice of Dr. J. S. Long, chemical director of the Devoe & Raynolds Company, to help increase lumber yard profits.

Federal Housing Commissioner Guy T. O. Hollyday reviewed President Eisenhower's housing program which was later introduced in Congress.

In New York late last January, J. Harold Stacey, retiring president of the Northeastern Retail Lumbermens Association, urged that dealers apply "the big four for '54—study, show, sell, serve" to assure another successful year. "We must visualize the needs of our public and take into account changed buying habits." he said.

Nearly 5,000 registrations were taken at Northeastern's 60th annual convention, which adopted resolutions calling on government to provide

Changing the Guard



Stanley W. Cowherd. 1953 president of the Home Builders Association of Greater Kansas City. hands gavel to Larry Winn Jr., new leader, at installation rites

Chosen by Northwestern Lumbermen



Officers and directors of Northwestern Lumbermens Association named at Minneapolis convention. Seated (from left). E. F. Buffmire, G. F. Westover, Bruce Hooper, treasurer; W. H. Badeaux, secretary; D. B. Taylor, president; N. D. Woodworth, vice president, Minnesota; W. E. Will, vice president, North Dakota; L. A. Giese, Standing, Harry McNeill, W. C. Morley, Robert Sloan, Cole Berry, C. J. Spahn, E. T. Lindeberg, Hugh Robertson, Joseph Chapman

Achievement Award



Edward G. Gavin, editor of American Builder, presents plaque at NAHB convention to William K. Kiser, citing Quad-City Association of Home Builders, Davenport, Iowa, as Group III, National Home Week winner

greater encouragement for purchase, modernization and improvement of existing homes; also to FHA home improvement loan amounts and terms.

New Northeastern officers elected were Deyo W. Johnson, Ellenville, N. Y.. president; Arthur Clifford, Bridgeport, Conn., Jay LeFevre, New Paltz, N. Y., Joseph E. Hollingworth, Lowell, Mass., and Duncan S. Briggs, Oneonta, N. Y., vice presidents; and Oliver J. Veling, Buffalo, treasurer. Paul S. Collier, Rochester, was renamed executive vice president.

Exciting sidelight to NAHB convention occurred when Emanuel M. Spiegel picked winner of \$60,000 Hospital Prize House for Long Island home builders

Long Island Builders, Labor Team To Present Hospital Prize House

Long Island Home Builders Institute joined with 18 building trade unions to build a large three-bedroom ranch house with quarter-acre plot and turn it over completely furnished to the Long Island Industry Hospital free of charge. Designed by Rudolph A. Matern and Herman F. York, it was decorated by Beatrice West with materials from 278 separate sources. Contributions from persons who wished to see the house and perhaps win it helped the builders reach their \$100,000 goal for the hospital fund. Winner of the house was picked at the NAHB convention where the proceedings were televised for later transmission in New York over the Tex and Jinx McCrary program.

Another hospital house is being planned for showing next fall.



AMERICAN BUILDER

Rochester Fetes Presidents



Prior to his election as NAHB president, R. G. "Dick" Hughes spoke at 20th anniversary meeting of Rochester Home Builders Association. From left to right are incoming president Alvah B. Lawson, Mrs. Lawson, Hughes, Mrs. Arthur M. Windsor, retiring president Windsor, executive secretary William J. Hill. Mrs. Hill

Woodwork Jobbers Change Name

The Woodwork Jobbers Service Bureau has changed its name to Northern Sash & Door Jobbers Association in an action taken by William C. A. Costello, president, and the board of directors.

Elected Milwaukeeans



Phil Herriges, new president of Milwaukee Builders Association, surrounded by his officers at installation dinner-dance Jan. 13. Others include Frank W. Beverly, first vice president (left) and Charles W. George, second vice president. Standing, Roy F. Healy, executive vice president, and Robert Grillhoesl, secretary-treasurer



Mrs. Henny Mollgaard receives Schroedel Traveling Trophy as outstanding builder member of Milwaukee Builders Association from its donor. Francis J. Schroedel, retiring president

Detroit Award Winner Was Featured in January Issue

The "Midwest Contemporary," low-cost home of modern design which tied for first place in the Detroit area National Home Week promotion competition co-sponsored by the Minneapolis-Honeywell Regulator Company and the National Association of Home Builders, was selected last fall by American Builder as its featured "blueprint house in the January convention issue.

Built by Edward Rose & Sons and one of Detroit's current "best sellers, the house shared award honors with the "T. V. House" developed by the Fred Garling Company.

Following publication of the Rose story, in full color and with complete blueprints. Don Munro, sales manager, said: "Winning this honor was one of the greatest thrills we have ever had. When you struggle and sweat and plan like we did to produce this home, it is very gratifying to have these efforts honored by such outstanding building authorities as the editors of American Builder."

Efforts Win Praise

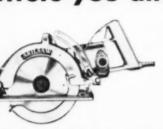


Ned A. Cole, Austin, Tex., builder-architect, receiving air conditioning industry's testimonial plaque from A. B. Newton, chief design engineer, Coleman Company, and Don V. Petrone, president, Typhoon Air Conditioning Company



Do you have trouble sawing these materials?

Only
"SKIL has the answer"
because only SKIL
offers you all this!



9 Extra-Heavy Duty SKIL Saws with high-torque worm drive. The favorite type for over 25 years on heavy ripping, tough metal and compositions that no other saw can handle. Absolutely minimum maintenance in heaviest service. Blade diameters from 6" to 12".

SHEET STEEL? • TRANSITE?

ROUGH FRAMING LUMBER?

COPPER OR LEAD?

ALUMINUM SHEETS OR EXTRUSIONS?

FORMICA? • MASONRY?

OR ANY OF THE MANY NEW PLASTICS

OR LAMINATIONS?

CONCRETE BLOCKS?



ially Designed SKIL Blades and

98 Specially Designed SKIL Blades and Abrasive Cut-Off Wheels carried in stock by SKIL Branches, and distributors. With the proper SKIL Saw you can efficiently cut almost any material encountered in the construction field with substantial savings in time and money.

3 Heavy Duty SKIL Builders Saws with high blade speed. Low in cost, light weight and easy to handle. The new SKIL Builders Saws are ideal for quick cut-off work and for use with SKIL abrasive cut-off wheels. Blade diameters: 6", 714", 814".

ONLY SKIL OFFERS THIS WIDE SELECTION OF SAWS, BLADES AND ABRASIVE CUT-OFF WHEELS

"SKIL has the answer" for builders everywhere

*With excessive abuse and constant use, SKIL tools require less maintenance . . ." says Thomas O'Donnell, field superintendent, Construction Company of Maryland, Baltimore, Md. "Our current project is a housing project for low income groups," Superintendent O'Donnell adds, "and I estimate we've cut at least 2,000,000 board feet on this job, using SKIL Saws. In my book, that's performance!"

Commercial Construction "Cuts anything, gives greatest accuracy. We use SKIL Saws exclusively!"—says E. J. Griser, foreman, Elwin G. Smith & Company, Emsworth, Pittsburgh, Pa.—Specialists in roofing and siding for commercial and industrial buildings. This firm cuts aluminum, asbestos, cement products,

plastics, plastic skylight material and galvanized sheet metal.
"We've had such great success with SKIL Saws that we've standardized on this famous make," says Foreman Griser.
"We now have 100 SKIL Saws in constant use."

Uses 18 SKIL Saws

"We can see the cut ... produce 30% faster with SKIL Saws"—says James

Morrison, foreman, Joseph R. Farrell, Inc., Philadelphia,
Pa. "We have 18 saws, all of them SKIL," says foreman

Morrison. "Position of blade and balance give us maximum

accuracy, easier handling and faster production. And the
main reason we swear by SKIL Saws is the worm gear—it

gives us more than enough power for tough cutting!"

Cuts Asbestos Cement "Give Me SKIL Saw Power For Fast, Clean Cuts In Asbestos Cement"—says Joseph Derry, Graver Construction Company, Chicago, New York, Houston, a division of Graver Tank & Mfg. Co., Inc. "Cutting this asbestos cement roofing would be tough going with ordinary saws, ordinary methods," argues Joe Derry. "But it's no work at all to make a fast, clean cut with the power and balance of this Model 825 SKIL Saw with an abrasive disc."



that will best answer your problem.

FREE! Ask for a demonstration—and a FREE Trial—of the SKIL Saw with the exact SKIL Blade or Cut-off Wheel to solve your toughest cutting problem

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For High Quality Woodwork ... Without High Cost



Specify arkansas soft pine Satin-like Interior Trim

Here's top quality woodwork equal on all counts to custom millwork, but providing the crucial advantage of sharply lower cost through quantity production. Crossett supplies this highly refined trim in A. I. A. approved contours or standard patterns, affording you the widest choice.

Truly Satin-like, Arkansas Soft Pine's soft texture works easily to close detail, contours matching exactly at miters. Free from pitch and supplied at specified moisture content, the wood doesn't shrink or swell. Thus stabilized, it absorbs primers evenly, holding finish coats uniformly smooth, permanently free from raised grain.

FOR BUILT-INS AND STAIR WORK

Of the same guild-craft refinement, are Crossett's related Arkansas Soft Pine products for built-ins, stair work and the like, identified by these trademarks and available at your local lumber dealer's. For further informa-Typical of authentic patterns tion, address: promptly available.

CROSSETT, ARKANSAS



SATIN-LIKE

INTERIOR TRIM

NORTHERN NEWS.

Roamin' the North-

Cincinnati will stage its first Parade of Homes during National Home Week next September, in which all houses will be light-conditioned, reports Wilford H. Miller, president. To stimulate ideas, HBA of Greater Cincinnati members will spend March 23 at General Electric's Nela Park in Cleveland . . . Cincinnati home show, April 3-11, will feature house winning Carrier Weathermaker home design contest, says Joseph F. Carabin, chairman . . . George M. and Alfred Gross, who as Gross-Morton built over 15,000 dwellings units on Long Island, have formed the Gross Brothers Corporation in New York City to engage in large-scale apartment work . .

(Continued from page 15-N)

Seventy-four builders attending the first Wisconsin Builders Conference sponsored at Stout Institute. Menomonie, Wis., heard that modular techniques will help them save valuable construction time and can be applied to any design that may come off an architect's drafting board.







Alfred Gross

George M. Gross

Ezra Osterhus

Griffith S. Clark of the Homasote Co., modular control authority who authored American Builder's extensive series on the subject last year, and R. F. Luxford of the Forest Products Laboratory conducted the shop courses . . . Ezra Osterhus will head the Minneapolis National Home Week Committee for 1954

Arthur Olesen, '54 head of the New England Council of Home Builders, is planning the group's first two-day convention for October. Hotel Statler, now nearing completion in Hartford. Conn., will be the setting . . . Burton B. Batty of East Providence is the new HBA of Rhode Island leader. His slate includes Ralph D'Ordine, Elio DeCesaris and Clinton Ainsworth, vice presidents; Frank Calabro, secretary. Romeo Picerne, treasurer. . . . Harrisburg (Pa.) Builders Exchange will stage a 482-booth show March 8-13, A. C. Horner directing . . . Russel R. Fling, Columbus HBA president, has named P. Edward Kreider to the executive secretary spot . . . First Parade of Homes in Dayton, Ohio, will have 23 model homes. Robert Clark, chairman of Montgomery County Builders Assn., will run the show.

Westchester's 'Big Four' Convene



Discussing national policy at Chicago NAHB convention are officers of Home Builders Association of Westchester, New York. From left: Charles L. Weinberg, alternate national director; Charles F. Haring Jr., first vice president; Edward A. Lashins, president, and Fred A. Rellstab, alternate national director

BUILDER

northern building weather for March

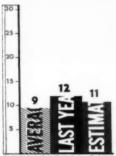
An exclusive American Builder service prepared by Irving P. Krick, Ph.D., and Staff

NORTH: During March, 1954 the northern United States should expect outdoor working conditions to be relatively close to normal. When compared with last March, only Area 4 shows major improvement in the outlook for the coming month.

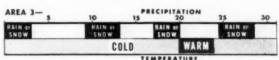


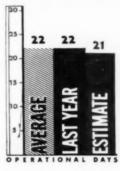
Timing of weather events is indicative of trends. Don't expect precipitation on every day of the period indicated





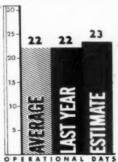
Warm and dry weather, as compared to normal, is in prospect for most of Area I during March of this year. In Michigan, however, rainfall totals are expected to be generally above normal and interruptions in outdoor construction are likely to be more frequent than over the balance of the area, Last year in March, Area I experienced warm and wet weather with only eastern North Dakota recording less than normal rainfall.





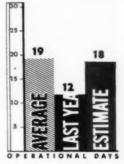
For March, 1954 the number of days suitable for carrying on out-door construction is expected to be less than normal. Rainfall amounts in excess of the critical value are likely to be the principal restricting weather factor. Temperatures during the month should average near to slightly above normal here in Area 3. Last year in March, warm and wet weather was observed.





Areas west of the Mississippi River may expect relatively favorable working weather during March, 1954 as mostly warm and dry conditions are in prospect. In the eastern portion of Area 2, however, warm and wet weather is expected to prevail with critical rainfall amounts likely to reduce the number of good working days here. During March, 1953, temperatures averaged above normal throughout the area with greater than usual rainfall occurring everywhere except in Ohio.





The weather during March, 1954 in Area 4 is expected to average about normal. Both temperatures and precipitation totals should average near normal for the month in contrast to the weather of last March when warm and very wet conditions prevailed. Thus, the estimate of about 18 good working days for the coming month is considerably higher than the total recorded in March, 1953.

CRITERIA

Special climatic studies were made for selected cities in each area to determine AVERAGE and LAST YEAR Operational Days, ESTIMATES are generally applicable to each area. Precipitation and temperatures extreme enough to stop outside work have been forecast as number of NON-operational days. Naturally, inside work (plastering, wiring, finishing, etc.) may on occasion proceed without interruption even through the cold and wet spells shown on the month's timing bar.

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you're getting the best deal in home heating and air conditioning equipment?

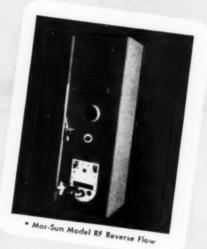




 Mor-Sun Model MLB Mighty Low Boy. 2 Models. Gas or Oil. Output Range 68,000 to 95,000 BTU/Hr.



Mor-Sun Model GP General Purpose



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Builders in all parts of the country are comparing the quality-toprice ratio of leading furnace lines... and are specifying Mor-Sun! It's not surprising when you consider what Mor-Sun offers...

- ... a complete quality line competitively priced.
- ... the right capacity, size and shape to fit every home.
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And—another Mor-Sun exclusive—all Mor-Sun Forced Warm Air Furnaces feature the unique Mor-Sun Heat Exchanger, fully guaranteed for 10 years.

WRITE FOR PRICES...
GET ALL THE FACTS

You get so much more with MOR-SUN



 Mor-Sun Air Conditioner. Two and Three Ton Capacity. Water or Air Cooled



 For quick servicing, all components are easily accessible by means of completely removable front panel.

AIR CONDITIONERS

Air Conditioning is one of today's greatest selling features for any new home. Be sure you're installing the best . . , specify Mor-Sun.

Here's why ...

- ...a complete quality line, competitively priced —for every central residential or light commercial application.
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Although Mor-Sun Air Conditioners are ideally matched with Mor-Sun Warm Air Furnaces, they can be installed as individual cooling units with any make heating system.

Check MOR-SUN for

a complete line . . .

top quality . . .

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Whether you're building one or several hundred homes—and regardless of size, type or price class—there's only one sure way to know that you're getting the best deal in home heating and air conditioning equipment. Fill in this coupon—attach it to your heating and cooling specifications—send them to us today for a quotation and all the facts about the complete Mor-Sun line.

Mor-Sun Forced Warm Air Furnaces and Air Conditioners are distributed nationally and sold through leading local heating equipment dealers everywhere.



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Please send me all the facts about Mor-Sun Forced Warm Air Furnaces and Air Conditioners.

Name

Street

City and State



Brick veneer, painted white, with horizontal strips in cedar shakes



NORTH

Chicagoan Irvin Blietz's 'new thought' house



Master bath has narrow twin glass jalousie windows



House has full storage attic, with disappearing stairway



Pecky cypress for paneling and beams, painted white and rubbed down. Lannon stone fireplace. Convert-a-wall (below) makes den into a bedroom

RVIN A. BLIETZ, well-known builder and developer of high quality tracts on Chicago's North Shore. is presenting this house as an appealing answer for buyers of conservative taste who want a house expressing the contemporary spirit. Modern planning, ease of household management, indoor-outdoor living. smart but not extreme architectural character, are all built into the "New Thought" house. It is one of seven types being offered by Blietz in a 62-house subdivision, Sprucewood Village, in Wilmette, Illinois. Lots average 80x130.

Blietz has coined several apt phrases to describe the features of the house. The window wall in the living room is a "Plant-a-rama," because it brings the garden inside. The beamed ceiling in the living room is a "Bermuda ceiling." The den can become a bedroom by use of a "convert-a-wall."

The house has a Mueller Climatrol heating plant with warm-floor recirculation system. Floors are Bruce prefinished oak. The house has Rockwool insulation and is completely weather-stripped and caulked.

The "New Thought" is priced at \$41,000. A garbage disposal unit and a dishwasher are included.

In showing this house. Blietz hit on a clever merchandising idea

which proved its worth. Just inside the fence at the front entrance (see photograph) was placed a wrought iron planter shaped like a tree. Suspended from it were cages of parakeets and other birds. Called the "Singing Bird Tree," this trick not only attracted much attention on open house days but held the sustained attention of small fry while their parents wandered unmolested through the world of "New Thought" living.



Plant-a-rama window wall has Arcadia sliding glass door with Thermopane. Cold air return grilles in curbing for plant areas



Certified

A Significant Development in Lathing and Plastering... of Vital Interest to the Building Industry!

This Emblem

of Certified Craftsmanship symbolizes higher standards of job performance and responsibility in lathing and plastering.

It is the emblem developed by the National Bureau for Lathing and Plastering, an organization of lathing and plastering contractors and lathing and plastering craftsmen.

Certified craftsmanship is a working reality. It means that job performance and responsibility will comply with the Code of Standard Practices for Lathing and Plastering, prepared by the National Bureau and subscribed to by local chapters throughout the country. Scores of such chapters are already established. New ones are being formed every month.



Craftsmanship...

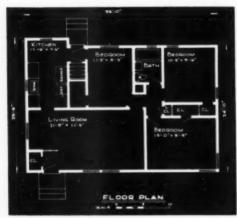
This Pledge of Performance

is your written and signed assurance that the lathing and plastering on your job will be in compliance with this newly adopted Code. It is a written commitment to work schedules, job cooperation, work of craftsmanship calibre and nationally recognized standards of quality. It is yours for the asking, on specific jobs, from lathing and plastering contractors adhering to the Code of Standard Practices for Lathing and Plastering.



For full appreciation of this Pledge of Certified Craftsmanship we suggest a thorough reading of the Code of Standard Practices which appears on the back of every pledge. Ask your contractor for a copy and for the complete story of this significant program.







a St. Paul tract house for modest incomes

T HIS model, with full basement, is being offered by the Bisanz Brothers Construction Company at \$13,250 in their newest subdivision. Riverwood Terrace, in St. Paul, Minnesota, Under 25-year FHA financing, required down payment is \$3,250, with monthly payments of \$73.65. A VA mortgage requires \$1.350 down, \$81.30 per month. The house is of drywall construction, has oak floors, pine trim, flush doors, combination storms and screens. Siding is of processed shakes over shingle backer, 1x12 V-joint boards applied vertically, and %-inch exterior plywood for end walls above ceiling.

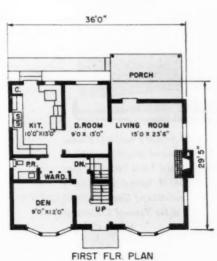


AMERICAN BUILDER



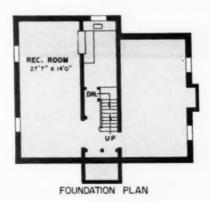
is the rambler on the way out? —a Michigan answer





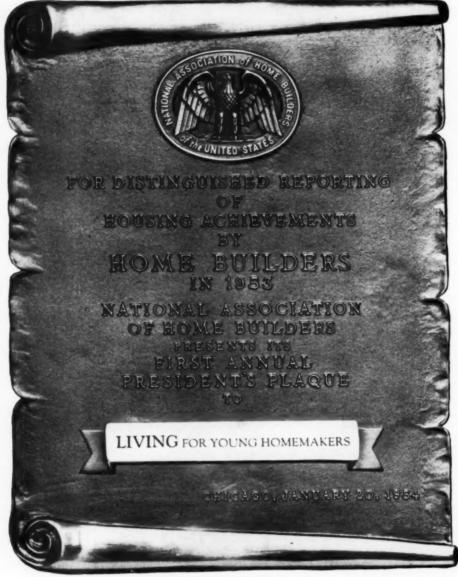
This house was built by Don L. Cederlund in Grand Rapids, Michigan, and sold, with double garage, at \$29,300. General reaction of people who inspected the house was so positive that Cederlund has been encouraged to build more of the same type. He finds that many prospective buyers who have been thinking in terms of the prevailing ranch type of house are now turning instead to this more conventional type. "It affords so much more living per dollar." Reports Cederlund candidly:

"If I made any mistake with this house, it was in being perhaps too conventional. The next house of this type will incorporate an extremely different kitchen, designed along Provincial lines; an extremely different bathroom, and other features which I suppose would be classified as 'sales punch.' But the architecture will stick to traditional lines."



MARCH 1954

National Association



First Annual President's Plaque
presented on January 20th to
Editor-in-Chief Edith Brazwell Evans
by E. M. Spiegel, President of
the National Association of Home Builders,
at the National Convention
held in Chicago.

of Home Builders

honors

LIVING HOMEMAKERS



LIVING For Young Homemakers . . . and its enthusiastic and loyal readers . . . accept with pride and gratitude the first award ever to be presented to a magazine by the National Association of Home Builders.

This recognition by the home-building industry climaxes five outstandingly successful years in which LIVING For Young Homemakers was the only magazine to be twice awarded the home-furnishings industry's highest tribute*.

The acceptance of such a tremendous honor assures that

LIVING For Young Homemakers will continue to encourage and activate

all phases of home ownership in America's

most rewarding market — Young Homemakers.

Dorothy Dawe Award
"distinguished reporting of home furnishing

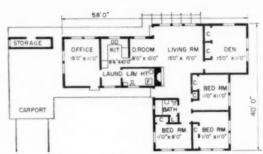
LIVING For Young Homemakers—575 Madison Avenue, New York 22, New York
Street & Smith Publications, Inc.





a trail blazer in southern Ohio

F IRST contemporary-styled house to attract widespread attention in Scioto County, Ohio, is this design
of 1.500 square feet in a new subdivision at Portsmouth, it was designed and built by the Wm. A. Newman Company, custom builder, for \$11 per square
foot. Siding is redwood over Celotex insulated sheathing and 4-inch full-thick balsam wool insulation. Windows are Alwintite horizontal sliding aluminum units.
Roof is a 20-year built-up Carey. The perimeter heating
system uses an International counter-flow furnace with
Sonoair ducts. Floors are Kentile rubber and asphalt.
Interior finish uses butternut paneling for living-dining
room, Marlite for the bathroom and kitchen, Zonolite
plaster on gypsum foil-backed lath for the sidewalls, and
metal lath for the ceilings.



FIRST FLOOR PLAN

all-year air conditioning for Clevelanders



FIRST FLOOR PLAN

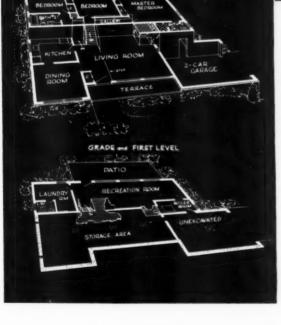


The Di Carlo Mason and Building Company of Cleveland, Ohio, has opened up that area's first major project offering all-year air conditioning as part of the package. Di Carlo's 50-acre tract, known as Alberta Park Estates, will have 140 houses of two, three, or four bedrooms, ranging in price from \$29,300 to \$33,500. Construction is brick veneer. All houses will have Perfection gas furnaces of 100,000 or 125,000 Btu's, and Perfection two-ton cooling units. If the buyer doesn't want the summer cooling, he pays \$300 less.



front-to-back split-level from Long Island

By putting the bedrooms across the rear, this split-level at Huntington, Long Island, avoids the conventional split-level look. It is being built by Hillside Terrace, Inc., on ½-acre plots, for \$22,500. The warm-air heating system has ducts suitable for the addition of a summer cooling unit.





Living room is one step below entry hall, has corner fireplace. Open mezzanine adds to spaciousness



Recreation room is on grade level facing garden at rear, extends 30 feet



Large or small...new or remodeled...the homes you build will have one or more telephones.

And most homeowners do want telephone wires concealed.

There's an easy, inexpensive way to provide for this. Have telephone conduits built in.

Your Bell Telephone Company will be glad to help you work out economical conduit installations. Just call your nearest Business Office.

BELL TELEPHONE SYSTEM





Give your homes extra sales appeal

with

Century" NU-GRAIN asbestos-cement siding

Colorful, attractive NU-GRAIN siding gives any type home a decided "plus" in the minds of prospective buyers. For here is a siding material that offers beauty, durability, and economy!

These remarkable shingles are made from asbestos fiber and portland cement-which makes them as permanent as stone itself. They won't burn, rot, or corrode; they can't be damaged by vermin; they are completely weather resistant.

And here's a feature really worth noting: To make the attractive NU-GRAIN shades as long-lasting as possible. K&M embeds colored ceramic granules into the shingles under hydraulic pressure. There's no paint or protective coating to peel or wash off-and no such finish need ever be applied. Both the color and the distinctive wood-grain pattern are designed for a lifetime!

What's more, because they are low in cost and easy to install, NU-GRAIN shingles help you hold down the prices of your homes, thus broadening your potential number of buyers!

Ask your K&M distributor to tell you more about these nationallyadvertised, widely-known shingles. Or, write directly to us for complete information.



These attractive shingles are made in four distinctive colors: NU-GRAIN brown, gray, whitetone, and green (illustrated).

KEASBEY & MATTISON

COMPANY . AMBLER . PENNSYLVANIA





Look what we got since our Daddy

NEW COLORED

With exclusive new deep-tone colors and glazed ceramic surface that's washable!

Ceramo in colors is completely different . . . the only glazed asbestos siding with deep, rich, modern colors that are unfading! Colors that have depth and character unlike any you've ever seen before!

"No other siding can



these rich, deep 'n mellow
CAREY CERAMO COLORS!"

- CERAMO CONGO BROWN
- CERAMO GRANITE GRAY
- CERAMO SHERWOOD GREEN

And don't forget! Famous Ceramo White—whiter than fine white paint by actual laboratory





got hep to CERANO

"Let Daddy tell you a few reasons why Ceramo is the goodest news in sidewalls!"



- Ceramo.ls Fireproof! Won't burn, char or melt in the hottest blaze. (Wood siding has virtually no fire-resistance; even aluminum melts at only 1200°F.)
- Ceramo is Washable! Should dirt, grime or ordinary stains soil Ceramo's lustrous surface, a cleaning with household detergent and water will renew its fresh sparkle.
- Ceramo is Color-rich! Ceramo colors have character and depth. They're not wishy-washy and weak. And they're unfading, thanks to Ceramo's exclusive glazed-ceramic finish.
- Ceramo Never Needs Paint! Ceramo actually pays for itself through savings in upkeep and maintenance. Make this fact known to your prospects and sales resistance melts away fast.
- Ceramo Won't Warp, Shrink or Curl!
 Made of asbestos and Portland cement,
 takes broiling sun and soaking rains in
 stride. Actually gets harder and stronger
 as the years roll by.

ASBESTOS SIDING

"Folks fall in love with Ceramo"

Carey White Ceramo siding has long been the World's standard for quality, durability and beauty in white sidewall materials. And new colored Ceramo offers the same proven advantages that made white Ceramo famous: Resistance to fire, insects, weather, dirt and grime, stains . . . A glazed ceramic surface that's 100% washable. *Plus* unfading, lasting colors that are bakedon as an integral part of the ceramic surface. No wonder folks can't resist Ceramo for their homes!

Fast, easy application, no special tools or equipment

You can plan a Ceramo job with full assurance that Ceramo's ease and speed of application will provide real economics. And your customers will like Ceramo's beauty, freedom from maintenance and painting expense. So don't even think about another sidewall material until you call for complete information on new Colored Ceramo! The coupon will bring you literature and samples. Mail it right away!

"Cut out this coupon 'n mail today! You'll be in clover with New Colored CERAMO"



The Philip Carey Mfg. Company
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In Canada: The Philip Carey Co., Ltd., Montreal 3, P.Q. SERVING HOME, FARM AND INDUSTRY SINCE 1873 Ceramo in Color

THE PHILIP CAREY MFG. COMPANY, LOCKLAND
Cincinnati 15, Ohio

Rush me all the facts about new
Carey Colored Ceramo!

Have your Representative call!

COMPANY

ADDRESS

CITY ZONE STATE

Another Flintkote First!

...The New Flintkote
SKYLINE

Roofing System
engineered especially for
Low-Pitched Roofs



The famous Flintkote laboratories are continually at work developing new roofing methods and materials—and improving on existing techniques and products.

Now, they announce a new 3-in-1 roofing system—Skyline—for low sloped roof construction. In *one* file, you have the answers to most of your modern-day roofing problems.

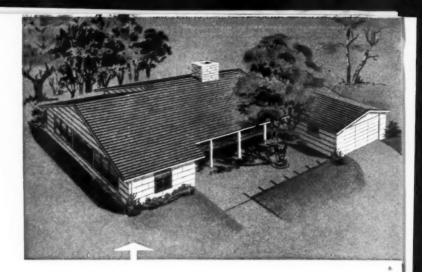
Skyline consists of three separate specifications: Skytab...Skytex...and Skykote.

Wire, phone or write for complete detailed information . . . and see for yourself.

THE FLINTKOTE COMPANY, Building Materials Division, 30 Rockefeller Plaza, New York 20, N. Y.

FLINTKOTE





SKYTAB

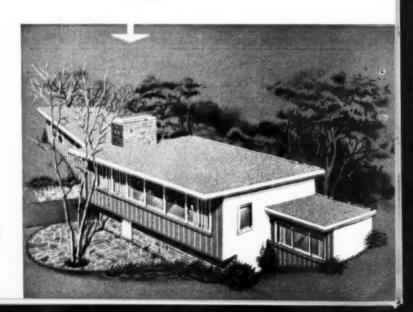
permits use of *strip shingles* on low sloped roofs, with either Standard or Custom application. It is ideal for ranch houses and other types of contemporary structures where roof slopes are within the range of 2" to 4" per foot.

SKYTEX

is perfectly suited for decorative, low sloped built-up roofing . . . either residential or commercial . . . where incline is from $\frac{3}{4}$ " to 2" per foot. Decorative beauty is accomplished by the use of protective Mineral Surfaced roofing felt . . . and it can be further enhanced with Skykote color.

SKYKOTE

is designed to recoat or color existing roofs or to decorate built-up roofs. Applied by either brush or spray—this beautiful coating really dresses up a roof—makes it stand out. Comes in white, green, gray, coral and buff.



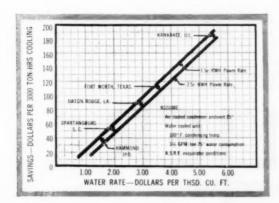
To make home selling easier ... BUILD IN **CHRYSLER** AIRTEMP

Air-Cooled Year 'Round Air Conditioning



For air conditioning this 1600 square foot house, the Chrysler Airtemp air-cooled condensing unit is on outside. Operating cost for 1953 cooling season -\$48. In nearby house of similar area, water-cooled air conditioning cost \$72 to operate for same period. Inexpensive water rate held difference down in this case. Also, cost of maintenance of water-cooled unit was not considered!

Chart below, based on average 3000 ton-hour load (8 hours continuous operation for 125 days), shows how savings increase for operation of air-cooled air conditioning over water-cooled in proportion to local water rates.



COSTS UP TO \$185 LESS* TO OPERATE PER COOLING SEASON . . .

Builders and their home buyers have welcomed it because it operates without water-requires no plumbing-costs less to install. And now you can build in Chrysler Airtemp Air-Cooled Air Conditioning to give your new homes the dramatic sales appeal of Year Round Air Conditioning—with assurance to the buyer that it should cost him substantially less to operate than conventional air conditioning utilizing city water.

*Cost of cooling for a season may run as much as \$185 less than with water-cooled equipment (see chart at lower left). Depending on local water and power rates and tonhours of cooling used in a home, this difference may be less-or even greater. From thousands of installations in homes in every section of the country, Chrysler Airtemp has accumulated data establishing the operating economy of its Air-Cooled Air Conditioning—the system which also gives the home owner complete protection against water shortages in hot weather.

Your local Chrysler Airtemp Dealer installs both Air-Cooled and Water-Cooled types of air conditioning-you can trust his recommendations! And whichever type you choose, you can depend on the Chrysler Airtemp name to give your prospects the utmost confidence in your houses!



 AIR CONDITIONING FOR HOMES, CARS, BUSINESS, INDUSTRY Airtemp Division, Chrysler Corporation, Dayton 1, Ohio

Airtemp Division, Chr. P.O. Box 1037, Dayton		AB-3-54 Sugaranteed by Good Housekeeping
I'd like to know more o	about Chrysler Airtemp Ai	Conditioning
I S INC IS KIOW IIIOIE (about Cityster Attemp At	Continoung.
	SUCCE CHI YSIEF ARTEIND AT	Conditioning.
Name	about Ciliysier Attemp At	Phone

THE TRULY MODERN HOME MUST BE AIR CONDITIONED

Mayo Clinic:

New Diagnostic Building gets same "prescription" as 1929 main building: Eljer fixtures!



ARCHITECT:
Ellerbe & Company, St. Paul
Contractor:
O. A. Stocke Co., Rochester

Plumbing Contractor: The Sanitary Co., Rochester Location: Rochester, Minn.



FOR NEW MAYO BUILDING

The Mayo Clinic's main building, completed in 1929, was equipped throughout with Eljer plumbing fixtures.

Now, the same "prescription" has been given the new Diagnostic Building—a strong testimonial to the *quality* and *durability* of Eljer fixtures.

There are two other big reasons for considering Eljer first:

1.) Eljer's strenuous program of design and development in specialized institutional plumbing fixtures—for hospitals, hotels, schools, prisons, and other public buildings. Eljer has a long and notable record of supplying materials in such fields.

2.) Eljer offers the builder, architect, and plumbing contractor a full, wide selection of cast-iron, steel, and vitreous-china fixtures, and of high quality brass fittings for specialized institutional and commercial tasks. You can specify all four from just one source, Eljer.

For the facts on Eljer advantages see your Eljer distributor, or write Eljer Co., Box 192, Ford City, Pa.

ELIER

A SUBSTRICT OF THE MURRAY COMPLICATION OF AMERICA

The only name you need to know in plumbing fixtures

news

ON THE NATIONAL FRONT

New Legislation Develops Slowly

Congress Gets President's Housing Message, But Early Passage of Bill Is Held Unlikely

Don't look for much in the way of new housing legislation before late May or June at the earliest. At least that was the prevailing opinion in Washington a few days after Congress received President Eisenhower's special message on housing.

The message went to Congress January 25. It was couched in general terms, and was not accompanied by detailed legislation. A bill embodying

the President's proposals remained to be worked out "cooperatively" between the Administration and Congress. That bill had not reached final form as late as February 7.

Most of the President's recommendations were in line with the report turned in last December by the Advisory Committee on Housing. It touched nearly all areas of government activity in the field of housing. As a result, Congress may be expected to move slowly in handling the legis-

The omnibus housing bill was slated for introduction in both the House and Senate by mid-February. The House Banking Committee said it hoped to begin hearings around March 1. Most observers think it will take at least 60 days after that, perhaps more, for the legislation to wind its way through the House and Senate.

Meanwhile, there has been cautious endorsement of the program outlined by the President. The National Association of Home Builders said the January 25 message made clear that private enterprise is the best way to obtain needed housing. But. NAHB added, the message did not contain enough "specifics" to determine its scope and workability.

HHFA Administrator Albert M. Cole was more enthusiastic. He said the President proposed a "helping hand" housing program designed "to make sure that every citizen who wants a better home has a real prospect of fulfilling that hope."

"Under this program the home builders can produce 1.000,000 houses a year without any question," Cole declared. Not only that, he added, but buyers can absorb this production.

The President himself explained to Congress that his program has "three important objectives": To emphasize the role of private enterprise and the role of local governments; to fill important gaps in the present housing program and eliminate obsolete activities, and to strengthen the administra-

Here are the highlights of the 8point program recommended by the

tion of all housing programs.

President:

1. Neighborhood rehabilitation and elimination and prevention of

(a) Title I should be broadened to provide loans and grants for renovation and for outright elimination of nonsalvable slums.

(b) FHA should be authorized to insure private credit used to rehabilitate homes in declining neighborhoods.

(c) A program of "matching grants" should be established to help states and cities do the "planning job" for rehabilitation.

2. Conservation of existing homes. (a) The maximum mortgage term for loans on existing houses should be made comparable to those for

new homes. (This aims at stepping up the trade-in program).

(b) The maximum Title I loan for repair and modernization of a one-family home should be increased from \$2,500 to \$3,000, and the maximum term extended from three to five years.

3. Housing low-income families.

(a) FHA should have new authority in order to insure long-term loans, with low down payments, on both new and existing dwellings. This would represent a "more posi-

(Continued on page 42)

Eisenhower Report Sees 'Good' Market for 1954

We are still confronted by a good housing market, and housing construction, which has played so important a role since World War II, may be expected to continue at a level close to that of 1953.

This view was expressed in President Eisenhower's "Economic Report." which went to Congress in January.

Vacancies in our cities are, with few exceptions, below the level regarded as necessary for a healthy, competitive housing market, the report said. It added that "other factors" on the side of demand include the continued movement toward suburbs, the high birth rate of recent years, and the improvement of incomes during the past decade.

"The recent easing of funds in the mortgage market will strengthen the forces of supply as well as of demand. Further, in contrast to earlier times. many of today's builders have considerable overhead expenses to reckon with, and they will not be adverse to making price concessions if this will help to keep their organizations in-

"Finally, if the volume of housing showed persistent signs of declining. the terms of FHA-insured mortgages could at once be liberalized under existing law," the report said.

Hugh Askew Leaves FHA To Head NAHB Mortgage Finance Dept.

Hugh Askew, Federal Housing Administration assistant commissioner in charge of field operations, resigned his post effective March 3 to become director of the National Association of Home Builders' mortgage finance department.

The appointment, announced in Washington by R. G. "Dick" Hughes. NAHB president, marks a new department in the organization.

Recently, Askew directed several field test cases to help determine FHA's position on the trade-in house program. Before coming to Washington, he had served as FHA district director in Oklahoma City.

'Dick' Hughes Elected 1954 NAHB President

Texas builder R. G. "Dick" Hughes was named president of the National Association of Home Builders at the group's tenth annual convention-exposition in Chicago, January 17-21.

The 48-year-old Texan, NAHB's first vice president during 1953 and a member of President Eisenhower's Housing Advisory Committee, succeeds Emanuel M. Spiegel of New Brunswick, N. J. and New York City, as head

of the nation-wide builders' organ-



R. G. "Dick" Hughes

The 1954 convention, attended by a record crowd of more than 20,000 persons from every section of the United States, also saw Nathan Manilow of Chicago elected first vice president for the 1954 term.

Other Officers Elected

Other NAHB officials elected were: Second vice president-Paul L. Burkhard, Glendale, Calif.

Treasurer-V. O. Stringfellow, Seattle. Wash.

Secretary-Franklin L. Burns, Denver. Colo.

Hughes makes his home and business in Pampa, Texas, and builds several hundred low-cost houses annually in the Texas-Oklahoma Panhandle area. As one of the largest project builders in the Southwest, he won national recognition for pioneering new construction techniques and for introduction of air conditioning in low-cost homes.

He is president of the Hughes Development Company in Pampa, and directs numerous other corporations and partnerships in addition to three West Texas radio stations.

Long Active in NAHB

The association's 1954 president has been a leading figure in the association for many years. As first vice president in 1953, he was a driving force behind legislative programs which the home building industry successfully advocated to Congress. President Eisenhower selected him to serve on the special advisory committee which drafted recommendations for the Administration's new national housing program.

Prior to his election to the NAHB presidency, he had held a number of national offices with the association. including secretary, treasurer, chairman of the Legislative and Defense Housing Committees, and chairman of the Regional Vice Presidents'

Chicago Builder Elected

Manilow, who was born in Baltimore in 1898, moved to Chicago in 1909 where he was later to enter the home building field. He has developed and built Jeffrey Manor on



Nathan Manilow



Paul L. Burkhard

Chicago's South Side, the largest single development within the city's corporate limits, as well as the nationally-known Park Forest project. America's first completely planned private enterprise community. He has built thousands of homes in other Illinois and Indiana areas surrounding Chicago.

Manilow served as treasurer of NAHB from 1949 to 1952, has been a member of the association's executive committee for eight years, and is chairman of the Building Committee





Franklin L. Burns V. O. Stringfellow

in charge of constructing NAHB's new National Housing Center in Washington, D.C. In addition, he was president of the Chicago Metropolitan Home Builders Association for two years, and its treasurer for four years.

Ten new national NAHB directors at large are: Martin L. Bartling. Knoxville, Tenn.: Seborn Collins, Las Cruces. N. Mex.: Albert J. Balch. Seattle: Joseph B. Haverstick, Dayton. Ohio: Waverly Taylor, Washington, D.C.: George Goodyear. Charlotte, N. C.: Joseph W. Entress, Rochester, N. Y.: O. G. "Bill" Powell, Des Moines: Carl Gellert, San Francisco: and W. Hamilton Crawford, Baton Rouge, La.

NAHB Cites Nine Builders in Design Competition

Six winners and three honorable mentions were cited in the annual National Association of Home Builders Design Merit Award Competition. sponsored by the NAHB Construction Committee.

Six builder-architect teams were selected for producing the most outstanding new house designs in 1953, according to the panel of judges. The competition was initiated to recognize excellence and initiative in modern home design.

The jury of three nationally recognized architects and one builder consisted of W. Alex Simms. Dayton. Ohio, the builder member, and architects Herman York, Jamaica, N. Y.; Alfred B. Parker, Miami. Fla., and Edward Burch, Wilmette, Ill.

Honors went to the following builder-architect teams:

George Alexander Co. and architect Edward H. Fickett, both of Los Angeles, for the 30-unit Sunset Lanai apartments in Los Angeles.

Myron Aiches, Blue Ribbon Construction Co., Hollywood, Calif., and architects Smith and Williams, Pasadena, for 13 houses at Reseda, selling for \$16,500, including lot.

David D. Bohannon Organization, San Mateo, Calif., and architect Mogens Mogensen, also of San Mateo, for an \$8,600 house at Mayfair Heights, San Jose.

Stern & Price. Cupertino, Calif., and architect Alexander C. Prentice, Jr., Palo Alto, for a \$7,150 house on \$1,800 lot in Cupertino, Calif.

Pardee-Phillips Construction Co., Los Angeles, and architects A. Quincy Jones and Frederick E. Emmons, also of Los Angeles, for 21 houses at Southdown Estates, Pacific Palisades, Calif. Houses sold for \$19,950.

Luria Brothers, Arlington, Va., and (Continued on page 48)



BUILT FOR THE FUTURE

The future of America belongs to its school children. Thus, today's efficient modern school buildings are "Built For The Future" in more ways than one.

Increasingly, school boards who look to the future favor schools built with reinforced concrete. Such construction means clean lines and attractive appearance . . . extra strength and durability . . . long-lasting weather resistance . . . utmost protection from fire.

School builders, architects and engineers find it pays to specify CF&I Clinton Welded Wire Fabric for their concrete reinforcing needs. This fabric provides strong steel members closely and uniformly spaced for proper load distribution and added strength. CF&I Clinton Welded Wire Fabric meets all A.S.T.M. requirements; is available in all popular sizes and weights.

THE COLORADO FUEL AND IRON CORPORATION, Denver end Cakland WICKWIRE SPENCER STEEL DIVISION, New York, New York

CLINTON

FNMA Raises Price On FHA, VA Mortgages

The Federal National Mortgage Association has raised sale prices on its 4 per cent and 4½ per cent FHA-insured and VA-guaranteed mortgages by two points, HHFA Administrator Albert M. Cole announced on February 1.

The action, Cole said, reflects improvement in the mortgage market, and the "firming up" of government long-term bond prices.

"Under the new schedule for mortgages on one-to-four family dwellings. FNMA will sell VA 4 per cent mortgages at 98, and FHA 4½ per cent mortgages under Title II. Section 203, and Title IX, Section 903, at 99.75," Cole announced.

FHA and VA 4½ per cent mortgages will be sold at par. Cole added that FHA-insured mortgages for multifamily dwellings will continue to be sold on a negotiated basis.

Fannie Mae has been buying and selling FHA-insured and VA-guaranteed mortgages on a one-for-one basis since July 27, 1953. Latest available figures, for December, show that FNMA sold 7,930 mortgages during the month. These mortgages had gross value of \$61,000,000, and "practically all" the sales were under the one-for-one plan.

Lumber Dealers' Association Contest Entries Sought

The deadline for the receipt of entries in the 1954 Public Relations and Merchandising Contest being conducted by the National Retail Lumber Dealers Association is March 31. Every dealer member of the group's 32 federated associations is eligible to enter.

About half the entries received so far are said to describe public relations programs alone, and the other half deal with programs which combine public relations with good merchandising ideas. Any activity carried out since April 1, 1953 is eligible. Entries will be judged early in April by editors of building industry publications. Names of winning dealers will be announced in May during the meeting of the NRLDA's Board of Directors.

Special national awards will be made to the ten entries ranked highest by the judges. In addition, certificates will be awarded to the three best entries from each of the 48 states, and an honorable mention will be voted to each of the other entries which, in the opinion of the judges,

represents meritorious public relations or merchandising activity. A total of 168 awards will be made. Entries should be addressed to Public Relations and Merchandising Contest, National Retail Lumber Dealers Association, 302 Ring Bldg.. Washington 6, D.C.

Flint Builder Receives Achievement Plagues

Al Borgman, Flint, Michigan builder, was recently presented with two awards for meritorious achievement during his city's "Operation Tornado." He had served as general chairman of the organized volunteer building campaign held in Flint last August 29 and 30 to rebuild the city after a tornado had devastated one entire section.

Recently elected 1954 president of the Flint Association of Home Builders, Borgman holds in the accompanying picture two awards presented to him and to Flint by the National



Al Borgman

Municipal League and Look magazine, and by Emanuel M. Spiegel, retiring president of the National Association of Home Builders. The NAHB award, presented at the recent Chicago convention, was in recognition of Flint's volunteer service to its stricken neighbors.

"Operation Tornado" was accomplished by 7,800 volunteer workers who donated \$286,000 worth of labor time during the two-day rebuilding operation. Seventy-eight houses were roughed-in in two days time and 93 houses were finished during the two weeks following.

New Legislation

(Continued from page 39)

tive and direct" approach by the government, while offering a "challenge" to private builders and lenders. (Cole believes this experimental program will relieve the "pressure" for public housing.)

(b) Public housing should continue at a "reasonable level" in the meantime. Congress should authorize construction of 140,000 units during the next four years, to be built at the rate of 35,000 a year.
4. Minority housing.

(a) Steps must be taken to police slum clearance programs to prevent "dislocation" of minority families. In addition, adequate mortgage financing to build new housing for such families must be brought out.

5. Adjustment of FHA and VA mortgage terms.

(a) Government operations in connection with mortgage loans should be "judiciously adjusted" to prevailing conditions. Congress should grant the President authority to adjust maximum interest rates and loan-to-value ratios and maturities.

6. Secondary mortgage market facility.

(a) FNMA should be "reorganized" to require its users to invest their own funds and thereby retire government funds from secondary mortgage market operations.

(b) The new FNMA should have three "basic" responsibilities: Authority to issue and sell non-guaranteed debentures; authority to liquidate the present FNMA mortgage portfolio "in an orderly manand authority to borrow directly from the U.S. Treasury for the purpose of purchasing "certain kinds and types of insured and guaranteed loans when the President determines such action to be necessary in the public interest." (NAHB withheld comment on this secondary market proposal pending introduction of the bill itself).

7. Reorganization of federal housing activities.

(a) Present organization of federal housing activities is "unsatisfactory." and Congress will be asked to approve a reorganization plan for improving the "cumbersome and inefficient" setup.

8. Modernization of the National Housing Act.

(a) The basic housing law should be "modernized" to eliminate unnecessary provisions. Changes should include a new scale of mortgage ceilings "more realistically related to the increased cost of both singlefamily and multi-family structures."

BRIXMENT Better Mortar for Blocks



BETTER PLASTICITY

To build the best possible concrete-block walls, the bricklayer must use plastic mortar. The mortar must be plastic enough to stick to the long head joint. It must not drop off when the mortared edges of the block are swung to a vertical position and lowered into place. It must be plastic enough to enable the bricklayer to quickly and accurately tap the block down to the line.

Brixment mortar provides this necessary plasticity. Moreover, it stays soft and plastic long enough to let the bricklayer level, plumb and straighten the unit and adjust it to its final position in the wall before the mortar stiffens.



Spike Club Issues Membership Citations

Murray Hartt of Houston, Texas, reigns as "The Big Spike" because he obtained 46 new members for the Houston Home Builders Association in 1953. The newly-formed "Spike Club" is an organization set up last year within the National Association of Home Builders to promote mem-



Murray Hartt of Houston, the current "Big Spike", secured 46 new members for his local association

bership and good fellowship. The recent convention was the club's first.

The "Spike Club" awards were made to local builder associations which showed the best membership increase, both on a numerical and percentage basis.

Winner of the first award in Group I was the Building Contractors Association of California, with a membership increase of 196. Best percentage showing in this group was by the Home Builders Association of Greater Boston, which showed a 28.6 per cent increase in membership during 1953.

Second-place award in the Group I category went to the Houston Home Builders Association. This group added 105 new members for a percentage increase of 22.6 per cent.

The Group II winners were headed by the Home Builders Association of Memphis. With 134 new members and a percentage increase of 74.8 per cent, this association led the field.

Denver's Association of Home Builders was in second place with 97 new members. On a percentage basis, the second best showing was by the Associated Home Builders of Sacramento, up 50.5 per cent.

Omaha, Austin Among Winners

Group III was headed by the Omaha Home Builders Association, with 150 new members and a percentage increase in membership of 263.1 per cent. Second place in this category went to the Home Builders Association of Jacksonville. This group added 116 new members, for a percentage increase of 161.6 per cent.

Winner of the first award in Group IV was the Austin Home Builders Association. It added 158 new members in 1953, and showed a percentange boost of 359 per cent. Second place went to the Mid-Florida Association of Home Builders, which added 42 new members and made a 200 per cent increase.

The final awards in Group V went to the Home Builders Association of Tyler, Texas, and the Staten Island Home Builders Association. The Tyler group, in first place, had an increase in membership of 70, for a percentage showing of 437.5 per cent. The Staten Island builders added 30 new members, increasing their membership by 130.4 per cent.

Three lady home builders also were eligible for membership in the



Mrs Henny Moligaard. Milwaukee builder (left), and Mrs. N. R. Dichiara. El Paso builder, were two of the lady members inducted into The Spike Club. NAHB's new membership promotion and good fellowship organization

Spike Club. Mrs. N. R. Dichiara, builder from El Paso. Texas. and a national director of NAHB. earned the office of vice president for the coming year, due to her efforts in securing members in the local association. Mr. Henny Mollgaard. Milwaukee home builder, was also established as a bonafide member of The Spike Club, as was builder Lily Ann Snyder of Louisville, Ky.

Ten-Year Exhibitors Receive Plaque Awards

In all, 22 companies have participated in all NAHB annual expositions since their inception ten years ago. These firms received due recognition at the recent Chicago show in the form of handsome inscribed plaques with the insignia of the National Association of Home Builders at the top, and a citation below reading "Award of merit presented to (name of firm) for having participated in our first ten annual shows for home builders. 1945-1954." Each of the firms had a special plaque in its exhibit booth to identify it as among the "first 22."

The companies honored were American Builder, American-Standard, Briggs Manufacturing Co., Bryant Heater Division, A.G.E., Inc., The Celotex Corporation, Chrysler Corporation, Airtemp Division, Crane Co., Detroit Steel Products Co., Frigidaire Division of General Motors Corp., Insulite Division of Minnesota and Ontario Paper Co., Johns-Manville Sales Corp., Kohler Co., L. J. Mueller Furnace Co., New Castle Products, Parents' Magazine, Pratt & Lambert, Inc., R.O.W. Sales Co., Standard Dry Wall Products, Inc., United States Gypsum Co., Westinghouse Electric Corp., Youngstown Kitchens, (Mullins Mfg. Corp.) and Zegers, Inc.



The 22 exhibitors who received "award of merit" plaques from the NAHB in recognition of their participation in all ten expositions at the national convention



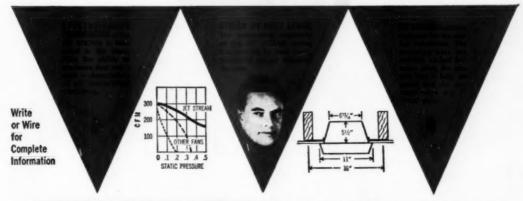
TREMENDOUS SUCTION ... UNUSUALLY QUIET ... PRIZE DESIGN!

Terrific performance at half the power—unmatched beauty—and tagged with a low L-O-W price is this new JET STREAM axial flow ventilator which Trade-Wind has developed under wraps over the past three years.

This revolutionary ALL NEW design now for the first time brings all the great advantages of straight-through axial air flow to the home ventilator field—and at a price that makes kitchen ventilation a BIG feature even for the lowest priced house.

In styling the JET STREAM is as outstanding as its performance. Completely original with its deep intake scroll, it's a prize beauty created by one of America's top industrial designers.

There's nothing that comes close to matching this all-new axial flow development by Trade-Wind. See it, test it, compare it and you'll understand why the JET STREAM will sweep the light construction market.



ORIGINATED BY TRADE-WIND MOTORFAMS, INC., 5705 S. MAIN ST., LOS ANGELES 27, CALIF.

NOW...the research, experience and quality

standards which made WARE

WINDOWS national favorites have produced the

BEST JALOUSIE VALUE

on the market!

The New Ware-Tite Jalousie -Designed with YOU in Mind!

Ware engineers have combined the best feaware engineers have computed the best rea-tures of competitive jalousies (further improved by Ware experience and research), and proved by ware experience and research, and have added exclusive Ware developments to achieve the ultimate in simple installation and enduring, weatherlight performance!

- © COMPLETELY WEATHERSTRIPPED Floating © COMPLETELY WEATHERSTRIPPED — Floating at a long the lambs, weatherstripping at head and silli
- Smart, Heavy-duty, crank-type operator locks
- Heavy, deep-frame extruded section 31, " min. Adaptable in the field to variable widths. QUICKLY ASSEMBLED-only8screws required Shipped KD — store 100 units in 50 cu. ft.
- Louvers open a full 120 degrees for maximum
- Interchangeable aluminum storm sash and Sure-Lock glass clip eliminates rattling,

DEALERS - DISTRIBUTORS!

GET ALL THE PROFIT-BUILDING FACTS today. Write Dept. B-2.







Econ-O-Ware





Projected







Ware Laboratories, Inc., 3700 N.W. 25th St., Miami, Florida

NAHB President Calls for 1.400.000 Homes a Year

The 1954 president of the National Association of Home Builders, R. G. "Dick" Hughes, has called for a "ten year campaign to clean up slums, keep America in needed new housing and get ready for a family formation boom in the 1960's."

The newly-elected spokesman for the home builders outlined a broad program' for meeting the nation's housing needs. Speaking at the recent NAHB Convention-Exhibition in Chicago, he called for the construction of 1,400,000 new houses a year over the next ten years.

Hughes said the attainment of this program hinges on whether Congress provides new "legislative tools." He endorsed the program outlined in the report of President Eisenhower's Advisory Committee on Housing—with one major exception.

"The recommendations contained in that report will be a hoax, and we who proposed them will be a laughing stock unless we get a federally-controlled and supervised central mortgage bank getting its money from private sources," Hughes said. He added he believes there is a "good possibility" the builders will get what they want.

The new president promised to push ahead with programs initiated by his predecessors at NAHB—better design and eye appeal for American homes, improved construction techniques, the rehabilitation of slum areas and homes for America's forgotten families.

"A combination of these four objectives will provide a tremendous housing program for 1954." Hughes said. The old problems are still with us, and our population is still growing, he added.

The NAHB president said he did not believe it "economically possible" to put every American in a new house. He said he did not agree, either, with the idea of destroying homes which are structurally sound and can be rehabilitated.

"I do believe," he said, "that every American family deserves, and should have the opportunity to live in a decent, safe and sanitary house."

Home builders can expect a "tremendous increased need" for houses in the early 1960's because of the increased family formations. Hughes continued. The most practical solution, meanwhile, is to combine the construction of new homes with the "new conditioning" of existing houses.

"There are approximately eight million families living in houses unfit for human habitation and another

(Continued on page 48)

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Dickerman's Column

John M. Dickerman, Executive Director, National Association of Home Builders of the United States

Residential Construction Safety Standards Code Coming Soon

An important milestone in the development of the home building industry as a mature, responsible element of our national life will be passed this spring with the completion of the first practical code of safety standards for home construction.

Recognizing the key role of the builder and his architect in curbing the shocking toll of death and injury caused by accidents in the home, the National Association of Home Builders and the National Safety Council have developed a comprehensive checklist to serve as a guide for the entire industry in building safer homes.

Even within the industry, few people recognize that each year more than 4,000,000 persons (roughly one out of every 37 Americans) are injured in accidents occuring in or around the home. Some 31,000 deaths annually are traceable to home accidents.

The new set of standards, which will be distributed on a nation-wide basis, should serve to reduce such accidents to a minimum. The design and construction criteria will increase home safety and structural soundness without increasing the cost of materials, methods or equipment.

This column cannot give complete details of the new safety standards, many of which are still being revised at this writing by NAHB's Construction Committee in collaboration with the Safety Council. But there are some general safety practices which builders and architects can and should take into account in their new home planning.

For example, safety outside the house is an important consideration that is too often overlooked. Hilly or irregular home sites should be terraced or re-graded to a gentle slope, and retaining walls, where needed, should be built as low as possible, and should be topped by a fence or guard rail. Terraced areas and retaining walls should be well lighted; permanent, safe covers should be provided over all ground openings, and projections should be well marked. Hedges, shrubbery or trees which hide driveways or prevent a clear view of the street from the driveway should be removed, and non-skid surfaces on all walks, steps, driveways, patios and porches would aid greatly in preventing falls.

Good lighting and the use of non-skid flooring materials also are important safety factors for the basement. Here, too, the builder and architect should provide for sufficient ceiling height, easily accessible fuse boxes, and safe grounding for all electrical equipment.

The bathroom can be one of the deadliest parts of the house if it is not properly safeguarded at the time of construction. Non-skid floors and grab-bars for tub and shower are obvious precautions. But accidents also can be prevented with a little care in locating electrical switches out of reach of the tub or shower, insulating electrical switches, and providing a lock for the medicine cabinet so that small children will not be able to get at poisons or harmful drugs.

Other parts of the house also contribute to the accident toll, and must be properly safeguarded. Hallways, for example, should be as short and straight as possible and not less than three feet in width; sliding doors should be provided on all closets which open on halls, and dangerous changes in floor levels between rooms should be avoided.

General construction, electrical wiring, plumbing and heating, fire resistance and insect and rodent protection are all important factors which, when properly considered, can add greatly to home safety.

With these new standards, home builders and architects for the first time will have a clear, simple and detailed guidepost by which they can readily build into their homes the safety which the public interest and the stature of their industry demands. The effectiveness of these measures will depend upon the extent to which they are put into practice by every member of the industry.

1,400,000 Homes

(Continued from page 47)

four million in houses that have deteriorated to a point where they lack necessary health and safety features," Hughes declared.

The NAHB official gave this breakdown on the 1,400,000 new units needed yearly: Larger houses with greater comfort and more livability should account for 1,000,000. Another 250,000 should be well-designed small houses for low-income families. Still another 150,000 would be built to replace units that are demolished in slum clearing programs.

Conservation and rehabilitation of existing structures are also in the home building picture. Hughes said. The so-called trade-in plan should be developed in order to "new condition" 250,000 units a year, while urban renewal accounts for another 350,000.

Hughes wants special attention for the small town and city which, because of insufficient mortgage money, "shows signs of dying on the vine." He said lack of housing has kept "scores of corporations" from establishing plants in smaller communities.

On the outlook for housing in 1954, Hughes said consumer demand has shown "marked improvement" since the first of the year. He believes there will be a good market if down payments are lowered for buyers in the middle and lower income groups.

VA Guaranteed More Home Loans in 1953 Than 1952

Home loans guaranteed by VA during 1953 increased by nearly five per cent over 1952. More than 320,000 home loans, totaling over \$3 billion, were guaranteed last year, compared with 306,000 home loans, totaling over \$2.7 billion, in 1952.

VA reported approximately twothirds of the veterans who obtained GI home loans in 1953 bought newlybuilt homes. This added up to about 200,000 new homes, or approximately 20 per cent of the one-family and twofamily homes built during the year.

Average purchase price for these GI homes was \$11.275 in 1953, compared with an average of \$10.915 in 1952.

"Larger homes with additional equipment have in part accounted for the upward trend in the purchase price of new homes bought with the aid of GI loans." the VA said.

The "typical" GI home loan in 1953 called for a down payment of 11 per cent and ran 20 years. During the last quarter of the year, about 38 per cent of the loans had a 25-year maturity, and another 10 per cent had 26-year to 30-year terms.

Dealer's Viewpoint

H. R. NORTHUP. Executive Vice President.
National Retail Lumber Dealers Association

NRLDA's Advertising Guide Will Pay Off in 1954



It has become crystal clear that retail lumber and building materials dealers are going to get far better results this year and in the future from the approximately \$40,000,000 they spend yearly on advertising.

One reason for the improvement is that dealers have received valuable advice and guidance in planning and preparing advertising through NRLDA's Dealer Operating Guide.

That help will be augmented through the new Quarterly Merchandising Calendars that will go to members every three months as an association service.

In addition, building products manufacturers and commercial mat services are planning to offer dealers a better assortment of advertising mats and materials to aid them in preparing good advertisements.

The recently issued Operating Guide chapter entitled "Preparing Your Advertising" contains this advice on the selection of themes or appeals to be featured in dealer advertising:

"In all advertising, the dealer is talking to a passing parade made up of individuals from nearly all walks of life whose needs are changing almost every day. Basically, the task of advertising is to present a message which will catch the eye or the ear of an audience which is in the market, or can be persuaded to enter the market, to buy your materials and services. Customers'

needs, and their desires to fulfill those needs, change with the seasons of the year.

"In other words, in the fall many people are in the market for storm sash; in the spring there are many who are looking for screens. That is why the NRLDA Merchandising Calendar has been produced to give lumber dealers a program of sales messages geared to the seasons. Following such a program helps to insure the presentation of the right merchandise at the right time.

"Timely seasonal and climatic offerings are all-important in advertising because they create not only a greater audience for your advertising but also a much greater responsiveness and that, primarily, is what every advertiser is most interested in.

"When people need anything they naturally shop ads on that particular item. If a woman is in the market for a hat or a dress, she pays close attention to advertisments featuring fashion merchandise when she reads her newspaper. It's the same way with products that dealers have to sell, If a man is in the market for a garage, he looks at garage ads. So a cardinal advertising is:

"One of the surest ways to gain advertising readers or listeners is by making timely offerings week after week. Use the Merchandising Calendar to help keep you on the right track."

Building Trades Wages Continue To Increase

Another "slight advance" in the hourly wages of the construction trades occurred during the fourth quarter of 1953, according to the Bureau of Labor Statistics.

BLS conducted a survey of seven major building trades in 85 cities. The agency found that the average wage rate for organized construction workers was \$2.72 per hour as of January 2, 1954.

Hourly wage scales for the seven building trades increased about 11 cents an hour during 1953. This compared with a 15-cent increase during the previous year.

Bricklayers were, on the average, the highest paid as of January 2. Their average wage level in the 85 cities was \$3.30 per hour.

NAHB Cites Nine Builders

(Continued from page 40)

architects Keyes, Smith, Satterlee & Lethbridge, Washington, D.C., for 49 houses at "Pine Spring" in Fairfax County, Va. This is a \$14,000 house with carport on \$2,500 lot.

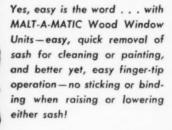
Honorable mention awards were made to the following:

Robert Gerholz, Gerholz Community Homes, Flint, Mich., and architects William K. Davis & Associates, Ann Arbor, for houses in Westgate Park.

Howard C. Grubb, Tulsa, Okla., and architect Donald C. Honn, Tulsa, for houses in the Lortondale Addition at Tulsa. It is a \$13,000 house on a \$2,250 lot.

Elliott B. Badanes, South Orange. N. J., and architect Harry Maslow. Elizabeth, for their Sunset Valley project of medium priced homes.

EASY DOES 15





All MALT-A-MATIC Wood Window Units are fully weatherstripped and feature the "400" weatherstripping metals. Modular construction, plus the use of jamb liners, enables fitting in any thickness or type of wall.

Only select, kiln-dried woods are used in all MALTA Wood Window Units...chemically treated for a water repelling, longer lasting, easier to paint surface... highest quality at down to earth prices. Yes ... Easy Does It! Plan now to use MALT-A-MATIC windows in the homes you plan and build. They make new homes easier to sell. See your nearest MALTA dealer or write for literature.

Supreme Quality Since 1901





Member Ponderost Pine Woodwork Assn., and N.W.M.A., N.A.H.B.



CORBIN

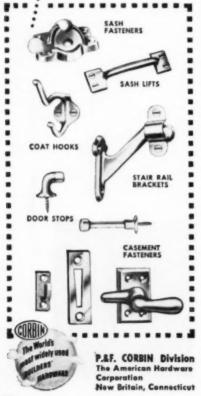
Aluminum Trim Hardware

STRONG RUST-PROOF

AND LOW-COST, TOO!

At no extra cost you can give your customers trim hardware with handsomer finish, superior strength, better quality!

Corbin Pressure-Cast Aluminum Hardware won't rust — keeps its smooth beauty for years. Never needs painting. Far and away your best buy! Phone your Corbin dealer today.



ON and OFF the RECORD

SOME TRADE-IN selling enthusiasts are beginning to weigh the practicability of allowing home owners to take income tax exemption on 35 to 50-year depreciation schedules.

REASON IS THAT when a tradein deal on an old house for a new one is broached, most owners feel that their home is an investment, and that trade-in appraisal should be on a basis of appreciation rather than depreciation.

IMMEDIATE OBJECTIONS and problems surrounding such a proposal are, of course, legion.

FIRST, the average home owner would likely shudder at any suggestion that he depreciate the entire value in anything less than a century.

AND, INDEED, there is ample evidence to substantiate such an attitude.

DEPRECIATING over a century, however, would provide an annual deduction on income tax so small as not to make it worth while.

IF THE TOTAL value were depreciated over a 35 to 50 year period the annual deduction would increase, but it is questionable if the amount gained on income tax payments would compensate for the thus admitted depreciated value to the owner at sale time.

THEN, TOO, there would be little incentive to maintain a structure for effective life after the depreciation period.

AND WHAT would be debited against the depreciation factor for remodelling and additions to the house?

AND WHAT about clothing and automobiles? The former is an admitted universal necessity, and the latter marginal in some areas and conditions, actual in others.

NO MATTER HOW it is cut, if trade-in selling is to develop to proportions comparable with those obtaining in the clothing and automotive industries, builders, for the time being at any rate, will have to sell the desireability of the new and modern house, and a mark down on the old for the advantages of the new and modern just as competitive industries do.

OR, DO YOU THINK there is merit and practicality to the idea?

SEVEN major challenges, says The Urban Land Institute, confront those interested in development of metropolitan areas.

FOREMOST AMONG them is the urgent problem of raising enough public funds to provide schools, sewer, water, police and fire protection and other essential services in expanding areas. And do it without excessive real estate taxes.

MAYBE THE TIME has come to stop syphoning so much of the tax dollar to Washington for federal services. There is a limit to taxation, beyond which the incentive to create and earn is stifled.

MAYOR CZELUSTA of Toledo, Ohio, however, says that his city has solved the school problem with a simple municipal income tax that keeps pace with school requirements and provides a surplus for any conceivable demand. Real estate taxes are low and will remain low.

ANOTHER PROBLEM pointed out by the Urban Land Institute is the need for adopting performance standards in zoning regulations to control industrial air polution, noise, odors, fire hazards and traffic volume.

AIR POLLUTION, thought until recently to be the unique problem of Los Angeles, has reared its head as a major health problem in London, England, and at one time this fall, along the Atlantic coast, particularly New York and Philadelphia.

SMOG, generally believed to be a combination of industrial and automobile gasses, is an evil which, under certain atmospheric condi
(Continued on page 52)



TROUBLE-FREE CORBIN LOCKS?

Corbin's two new cylindrical locks, the "Guardian" and the "Defender", are made to END LOCK COMPLAINTS and COSTLY CALL-BACKS! They give you the three things you need most—BUDGET PRICES, EASY INSTALLATION AND TROUBLE-FREE SERVICE.

Take 5 minutes to compare! You'll be convinced you get more lock for your money with Corbin. You give more customer satisfaction . . . and at the same time you save servicing time and money. See your Corbin dealer today!



Defender CYLINDRICAL LOCKS



MEDIUM-PRICED, yet designed for any light construction such as fine homes, offices and stores! Exclusive "Velvet-Glide" action. Solid, brass, bronze, or aluminum exterior parts; rust-resistant interior parts. Fast, fool-proof installation. Corbin pin tumbler security.



P. & F. CORBIN Division

The American Hardware Corporation New Britain, Connecticut



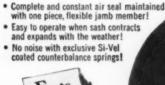
More often than not, it's the conveniences in a home that play cupid with the prospects and help them decide to buy. You get just such a sales clincher with Zegers Dura-seal Combination Metal Weatherstrip & Sash Balance!

Wives like the way Dura-seal keeps out dirt and dust... gives them a clean house the year 'round. Husbands like the way Dura-seal saves them up to 30% on fuel costs. Everybody enjoys the smooth, silent way Dura-seal equipped windows glide up or down.

So... make it a point *now* to use Zegers Dura-seal! Builders: see your lumber dealer—Lumber Dealers: see your sash and door or millwork jobber.

ZEGERS, Incorporated

8096 South Chicago Avenue, Chicago 17, Illinois





"Facts on Weatherstripping . . . gives complete information on Dura-seal. Send for your copy in



COMBINATION METAL WEATHERSTRIP - SASH BALANCE

On and Off the Record

(Continued from page 50)

tions, now seems to be a real or potential hazard in any industrial area, and is suspect as a major medical problem.

AT ONE TIME in mid-autumn, while New York, London and Philadelphia were blanketed by smog, the Pacific coast for several hundred miles north of Los Angeles was suffering from the acrid gas blanket.

AMONG THE OTHER problems outlined by the Institute are those concerning preservation of downtown shopping areas, the size, design and make-up of local shopping centers, intelligent use of land from which slums are removed, and greater emphasis on conservation.

MUCH OF THE time of the NAHB at its recent convention and exposition in Chicago was used for consideration of these and many related problems.

SPEAKING of the NAHB convention and exposition it was again bigger and better than any of its predecessors.

THE TWO-HOTEL exhibit arrangement apparently worked to the satisfaction of most of the exhibitors and delegates.

ONE LIMITATION of the present exhibit facilities, or possibly the season of the year in which the convention is held, is the lack of opportunity for the manufacturers of earth moving equipment and trucks.

THESE COMPRISE a major item in the home builder's capital investment, and he buys more of them each year as he is required more and more to manufacture his own land for building development.

IT HAS BEEN suggested that possibly a large circus tent in the park opposite the Conrad Hilton might provide an acceptable facility for exhibiting and operating trucks and earth moving equipment.

SINCE THERE is a large market for manufacturers of equipment and trucks among the thousands of home builders that attend the convention primarily to learn what they can buy to improve their opera-

(Continued on page 56)

The Specific Answer For Builders With Particular Needs

presents.

The Holpourt Custom Range Line FOR ULTRA MODERN CUSTOM KITCHENS

Incorporating the fine features that have always maintained Hotpoint's leadership in the range industry, this custom, sectionalized electric range offers an entirely new concept for modern kitchens. With separate built-in ovens and custom surface units, both carrying the approval of the underwriters' laboratory, here is your opportunity to provide the maximum in modern electric kitchen equipment.

U Super-30 Range Line FOR MORE EFFICIENT SMALLER KITCHENS

Where kitchen space is at a premium, Hotpoint's Super-30 Range line provides the answer. These are not just 30-inch ranges-but a feature-packed 30 inches.

Presented in three distinctive models, they have the de luxe features of 39-inch models packed into a range just 30 inches wide. They offer unsurpassed usable capacity for three-rack baking, compartment broiler, roto-grill with removable barbecue skewer, color-keyed pushbutton cooking, raisable thrift cooker with Golden Fryer French-fry unit, plus super-Calrod® surface units.

Write to Hotpoint Builder Division for A.I.A. specifications on these and all other Hotpoint appliances.

Hotpoint ... Pacemaker of Progress!

RANGES . REFRIGERATORS . DISHWASHERS . DISPOSALLS . FOOD FREEZERS . CABINETS . AUTOMATIC WASHERS CLOTHES DRYERS . ROTARY IRONERS . AIR CONDITIONERS . DEHUMIDIFIERS

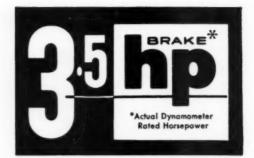
HOTPOINT Co. (A Division of General Electric Company) 5600 West Taylor Street, Chicago 44, Illinois

Only 22 Pounds Complete

NEW HOMELITE

MODEL 17

One Man Chain Saw



Cuts 18 inch trees in 18 seconds — Cuts trees 4 feet or more in diameter

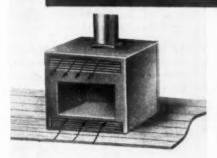
Here is the highest quality, lightweight chain saw at the lowest possible cost. It's the new Homelite Model 17... the mighty mite of chain saws... the only saw its size with 3.5 actual dynamometer rated horse-

power. Powerful enough to do the job faster... light enough to make the job easier... this new Homelite will save time, save money and cut labor and operating cost on every type of woodcutting job.





Packaged Fireplace!



Auxiliary Heating Circuit Insulates and Doubles the Heat Output!

- Complete, Self-Contained Nothing Else to Buy, Build or Add
- Will Heat an Entire Small House
- Up to 70% Savings on Fireplace Cost

Now you can greatly increase the sales-appeal of all your homes with a fireplace! Yes, the new, completely packaged AIR-JET makes a fireplace available at an amazingly low cost every home owner can afford... 1/2 to 3/3 less cost than a conventional fireplace of like size! And just consider these outstanding features...

AIR-JET—the complete, self-contained, insulated fireplace—is designed for zero clearance from combustible materials on all sides! Smoke-free operation assured. 30" firebox constructed of heavy steel and features smart, attractive black enamel front. Can easily be used with conventional chimney...

BUT FOR EXTRA ECONOMY, the perfect pair is the revolutionary new packaged AIR-JET FIREPLACE and the widely used AIR-JET PACKAGED CHIMNEY. Get complete information today on how you can give your home the extra sales-appeal of a fireplace with little extra cost!

Consult your distributor or write to

GENERAL PRODUCTS COMPANY

FREDERICKSBURG, VIRGINIA

Distributorships Available



McKINNEY HINGES are precision made of quality metals?

McKINNEY HINGES are available in all standard sizes and finishes for every hinge need?

The pins are perfectly rounded by a special rolling process to a tolerance of plus or minus one one-thousandth (.001), to assure proper fit with no looseness or wobbling?

McKINNEY PRIME COATED HINGES are carefully and thoroughly bonderized to prevent rust creeping?

They are prime coated with a neutral prime color approaching the tone of natural wood?

No extra primer is needed when painting them—and they take varnish or stain as well as paint?

Mckinney Bearing Hinges are available with self-lubricating Oilite bearings (oil impregnated powdered metal) at the same price as ball bearing hinges?

McKINNEY STRAP AND TEE HINGES AND HASPS are furnished bulk packed in protective boxes, which are then packed in convenient-to-handle shipping cartons?

McKINNEY SCREW HOOK AND STRAP HINGES have forged pintels with cut threads?

AND, DID YOU KNOW that these are some of the features that make McKINNEY HINGES so acceptable everywhere—and therefore so easily salable?

These are the basic reasons why architects, builders and owners alike agree that—"To be sure, you couldn't make a better choice than Mckinney HINGES!"













ORDER McKINNEY HINGES NOW



McKINNEY MANUFACTURING CO., 1715 Liverpool St., Pittsburgh 33, Pa.

On and Off the Record

(Continued from page 52)

tions, it might be well for these manufacturers to give some serious thought to how they might exhibit and thus advance their sales and customer relations.

INTEREST IN the numerous convention sessions was at an unprecedented and unexpected high.

BUT IT WAS noticeable to observers that the public relations and how-to-do-it sessions in both hotels were jammed to the limit of standing room, and that to get a seat required arrival at least a half-hour in advance of announced starting time.

BEST DESCRIBED as a twentyring circus, the mammoth show ran with a smooth professional efficiency that does great credit to Paul Van Auken and his staff, and to the tircless workers from the headquarters staff in Washington.

THE ENTIRE interlocking panorama of convention sessions, committee meetings and exhibit activity had to be timed to split-second precision, and at the same time have flexibility to provide for adjustments occasioned by last minute contingencies, of which there always are many. Nothing less than magnificent organization and a high sense of individual responsibility could have achieved such results.

AL BALCH SAYS that there must be about 35 billion dollars in real estate transactions each year in the United States.

HERE'S HOW he arrives at the figure. The state of Washington has two per cent of the national population. There is a one per cent real estate tax on all transactions in the state.

LAST YEAR the state tax receipts on real estate transactions amounted to seven million dollars. That means that there were 700 million dollars in transactions.

PROJECTED NATIONALLY, if Washington's two per cent of the national population represents the same percentage of real estate transactions, Al comes up with the 35 billion.



For individuality the "built-in" beauty of the Raynor Carved Raised Panel Door invites comparison!

With the design carved in 1" thick panel blanks (especially constructed by dielectrically gluing together narrow strips, for maximum strength) only the rugged durable construction and smooth performance of the Carved Raised Panel Door can match its beauty. Equipped with "Meter-Balanced" springs and Patented Graduated Seal, a Raynor Carved Raised Panel Wood Sectional Overhead Door can be operated by a woman or small child with ease.

Carved Raised Panels for these doors are available in two sizes—square, approximately 16" x 16" and long, narrow or streamlined, approximately 41" x 16".

See our catalog in Sweets. Check your telephone directory for the name of the Raynor Representative nearest you.



Builders who use Sta-Dri CLEAR-COAT on masonry discover that this transparent water repellent really keeps water out, but does not change the natural colors or textures. It is economical to apply by brush or spray. One easy application is enough!

If you haven't tried it, you're missing the best way to "package" and market beautiful masonry construction. In an ever increasing competitive market, this is the "plus" buyers are looking for—Sta-Dri CLEAR-COAT—invisible protection.

A M E R I C A N STA - D R I CO.
Brentwood, Maryland





how to build a lean-to atomic shelter in the basement

After several years of scientific research culminating in the Yucca Flats tests early in 1953, the Federal Civil Defense Administration has released detailed information on how to construct low-cost home shelters for protection against atomic explosion.

The cheapest type of shelter to build is the basement lean-to type, which can be built for an estimated cost of about \$10 per occupant (\$40 minimum) if wooden materials are used, or about \$16 per occupant if the shelter is built with reinforced concrete. The lean-to shelter is suitable for any house that has a basement with a floor at least five feet



Experts believe this is one of the salest shelter designs—for houses with basements which extend five feet or more below the ground leve!

(Continued on page 60)

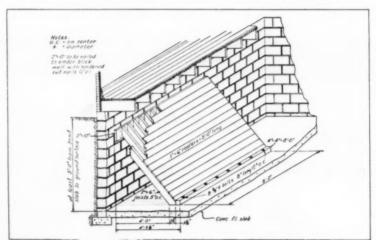


Fig. 1—Cutaway of the shelter used with cinder block wall

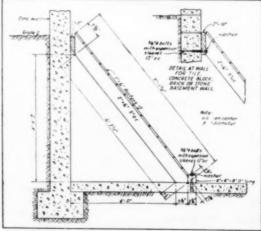


Fig. 2—Shelter used with poured concrete, concrete block, brick or stone basement wall

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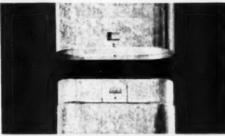


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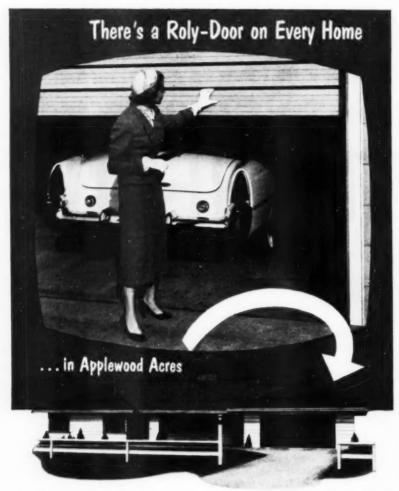
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— leader in gas venting.

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LOCATION: Toronto, Onterio

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Your Roly-Door Distributor also has a complete line of Roly-Doors for all commercial and industrial applications. Ask about them today.

build a lean-to

(Continued from page 58) below ground level at the location of the shelter.

Location and Size

The shelter should be located as far away as possible from the furnace. gas meter, water heater or any other source of fire. If possible, do not choose a spot directly under the piano or the refrigerator. Be sure that no permanent fixture on the basement floor, such as a drain. will interfere with the floor support of the lean-to. There should be at least three feet between the open end or ends of the lean-to and the corner of the basement wall or any large obstruction.

To determine the length of the shelter, allow two feet for each two occupants plus two additional feet for each of the open ends.

Building Method

If the basement wall is built of cinder blocks, the lean-to should be attached to the wall at the top as shown in Fig. 1. If the wall is of poured concrete, concrete block. tile, brick or stone, use Fig. 2 as a guide, Following are the materials that will be needed for an 8-foot wooden lean-to. Scrap lumber or sheathing may be used to cover the joists, but t&g roofers make a stronger job.

For use with basement walls of cinder block, concrete block, tile, brick or stone:

20 pieces-2x6x8

16 pieces—1x6x8 t&g roofers 1 piece—2x10x8

piece—4x4x8 -5s-inch diameter bolts by 8 inches with expansion sleeves and washers

%-inch diameter bolts by 4 inches with expansion sleeves (for concrete block, tile, brick, or stone walls only)
4 pounds—6 d nails

pounds—16 d nails pound—12 d hardened cut nails

For use with basement walls of poured concrete:

20 pieces-2x6x8 16 pieces-1x6x8

piece-2x8x8

piece—4x4x8 %-inch diameter bolts by 8 inches with expansion sleeves and washers

4 pounds—6 d nails 2 pounds—16 d nails

Testing the Floor

First check the basement floor to

atomic shelter

determine whether it is thick enough to support the lean-to and the weight it will have to carry. Measure a distance of about five feet out from the basement wall at the spot

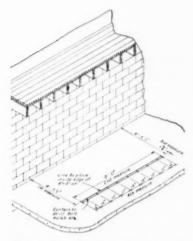


Fig. 3—Method of measuring and marking holes in basement concrete floor for wooden lean-to

selected for the lean-to. Test the floor for a length of eight feet at this distance, by giving it a series of hard blows with a heavy hammer. If no cracks appear and no hollow sound results, from the blows, the floor is strong enough. If it is inadequate, or the basement has an earth floor, a footing will have to be built under the floor end of the lean-to.

Figures and data from "Home Shelters for Family Protection in an Atomic Attack," Federal Civil Defense Administration



Another type of basement shelter recommended by the government is the built-in corner-room shelter

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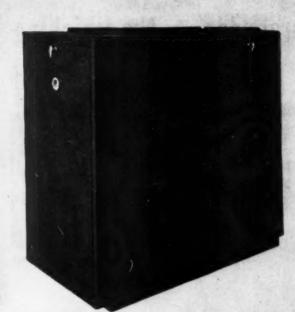
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Oil-fired types equipped with pressure atomizing burners, U/L listed and complying with commercial standard CS-75. Gas-fired units, A.G.A. approved for use with all types of gases, meet S.U.R. requirements.

You will be surprised at the reasonable cost of the SH model - it's priced right for today's more competitive heating market. Send off the coupon today for full details.

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Capacities-input	Capacities - output		
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SH 20G- 85,000	SH 20P- 80,000		
SH 22G-110,000	SH 22P-106,000		
SH 24G-140,000	SH 24P-143,000		
SH 26G-175,000	SH 26P-175,000		
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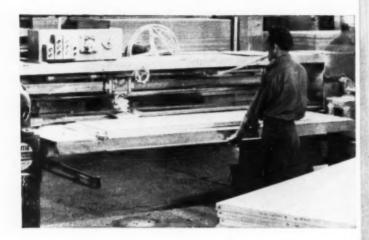
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*Aluminum siding is easy to work with and apply. Won't rot, warp, shrink, swell or crack. Fire resistant.



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Put aluminum's advantages, both in special designs and standard products, to work for you. Attractive appearance, long life, low cost, availability, ease of fabrication with regular carpenter tools -these and many other aluminum advantages help you build better, sell quicker.

Remember-for help on your building material problems, call your nearby Reynolds Architectural Distributor listed under "Aluminum" in the classified telephone directory. For more information, on the many uses and advantages of architectural aluminum in home construction, write Reynolds Metals Company, 2530 South Third Street, Louisville 1, Kentucky.

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ARKANSAS CITY, KANSAS

October 3, 1953

Mr. Elliot Mesnick, General Manager Emco Cement Products, Inc. Shamokin, Penna.

In answer to your letter regarding my progress as a new BONDSTONE franchise dealer, I am happy to report a terrific terrific with BONDSTONE. I have been selling HOME respection with BONDSTONE. Dear Mr. Mesnick: IMPROVEMENTS for fifteen years and have never handled a product that appeals to so many different people. Everyone wants BONDSTONE, commercial owners and home owners alike.

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Last week my BONDSTONE display at the Kay County Fair at Blackwell, Oklahoma, produced over 100 leads. Mr. Mesnick at times we could hardly breathe for the people around the display. Mesnick at times we could narrally breathe for the people around the display. Interest was fantastic. I certain appreciate the cooperation extended me and I am looking appropriate the cooperation extended me and I am 100king forward to a lasting and profitable future with BONDSTONE.

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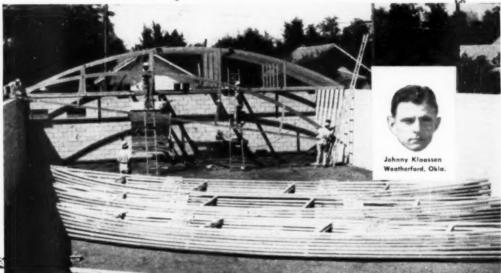
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Rilco glued laminated arches are prefabricated, precut and drilled for hardware furnished. Placed two feet on centers, they offer true level framing for roof and ceiling construction. Write for free data on tied arches.



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Design for kitchen-dining-play area by Richard Neutra, F. A. I. A.

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This diagram shows you graphically how Richard Neutra floor-planned his ingenious design for comfortable living in his kitchen-dining-play area. World famous architect Neutra used all of the virtues of clay to his design for a kitchen-dining-play area. The playroom and

World famous architect Neutra used all of the virtues of clay tile in his design for a kitchen-dining-play area. The playroom and patio floors flow naturally from the ingenious "stepsaver" kitchen. Cheerful tile work surfaces invite food preparation. The rear wall wainscoting presents a glistening, easily-cleaned surface that cuts down on cleaning chores. Clay tile can add much to *your* next residential, industrial or institutional project: top color and design potential, durability, ease of maintenance and real long range economy. Be sure to check comparative costs before specifying a substitute material—your clients will appreciate clay tile!

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Yes, the new home with a new Thor Built-in Electric Range has the "something extra" it takes to attract women—and to swing the buying decision in your favor. Instantly, this most advanced of all built-in electric

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The exciting principle of the TECHBUILT house is that you can buy as much space as you'll ever need for as little as \$10,000. Carl Koch cut a substantial slice of the building costs by turning the ground level into a warm, handsome, living floor. To do this he needed a quiet, comfortable, practical flooring . . . yet a flooring that would go on concrete slab. He found the perfect solution in Gold Seal Ranchtile, the only genuine inlaid linoleum developed and proved for installation on

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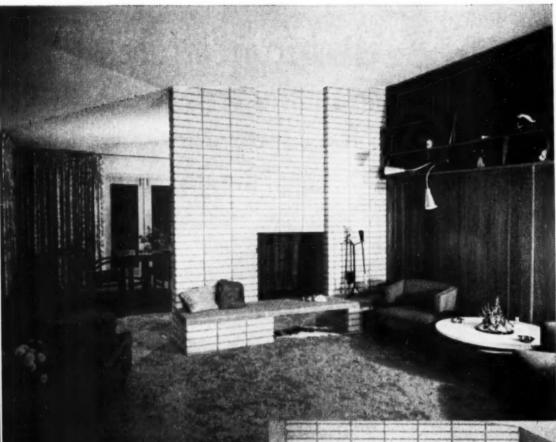
Resilient, easy to keep clean, moisture-alkali-andgrease-resistant, Ranchtile offers the Gold Seal Guarantee . . . satisfaction or your money back. Specify Ranchtile for *your* next on-grade project.

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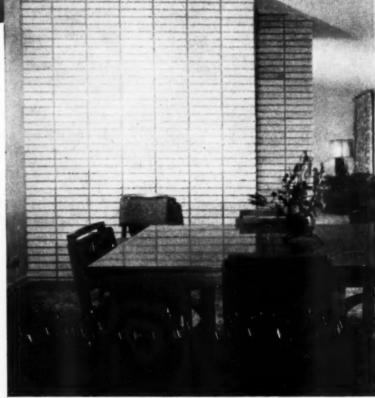
You'll want Ranchtile information right away! For details and free sample write the Builders' Service Dept., Congoleum-Nairn Inc., Kearny, N. J.



The living room (above) and the dining room (right) are designed as a single unit with a battery of windows providing a continuous exposure for both. However, extension of the fireplace into this area, at right angles to the side wall, gives the impression of two separate and distinct rooms

A built-in planter with storage space below separates the living room from the hall. Grille above is formed of 1x4inch vertical boards spaced diagonally to the wall surface





AMERICAN BUILDER BLUEPRINT HOUSE

BUILDER:

B. Stromberg Construction Company, Morton Grove, Illinois

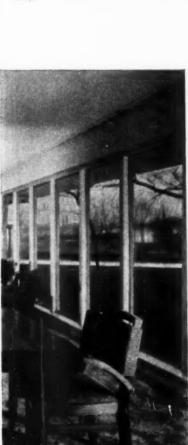
ARCHITECT:

Laurence Schwall, A.I.A., Evanston, Illinois

SQUARE FOOT AREAS

House, full area	1.730
Garage, full area	484
Porch. (1/2 of area*)	
Entrance and planter. (1/3 of area*)	25
Total ground area	2,363
Basement area	923

*For computation purposes, parch, entrywas and planter areas are tractional so that their cost per square foot will be in ratio with that of the house tiself.



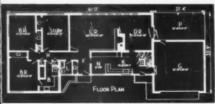


This ranch-type design, with its long sweeping roof lines and wide overhangs, produces a ground hugging effect that makes it adaptable to all areas

a house for today and every day

Designed in the popular ranch house style, this 1953 National Home Week demonstration house is one that meets every requirement for today's living. Through the skillful use of new materials, sound handling of design features and effective room arrangement, every-day living is made easier and more comfortable.

The house is divided into three zones—living, service and quiet or rest zone. Living-dining area and porch comprise the first; kitchen, garage and stairs the second; three bedrooms and bath the third. All rooms of each



MORE



The departmentalized bathroom is accessible from the hall and the master bedroom



The kitchen is planned for maximum efficiency with major appliances grouped in a compact unit. All cabinets are oak with a blond finish

zone are closely related and integrated to each other by the entrance hall. A powder room is conveniently located off the hall.

The living-dining area has an interesting and pleasing fireplace and extended brick wall which partially separate these two rooms. Buff colored Roman brick laid up in stack joints is exposed in both rooms. Raised hearth of the fireplace extends the full length of the brick wall above, and the open area under the hearth provides ample storage for firewood.

Ceilings in these rooms are sloped, with an eight-foot height at outside wall increasing to ten feet at the opposite wall. Vertical 1x10-inch redwood paneling is the facing material for the wall adjoining the fireplace in the living room. Two rows of horizontal shelves are placed on this wall at door height for book and knick-knack display.

The service zone—kitchen and breakfast area—is an example of compact convenience. It is easily accessible from all parts of the house, Equipment, including sink, refrigerator, built-in oven and counter top plate, is ar-

ranged on two walls for easy accessibility.

Stair at one end of kitchen leads to a large basement space containing recreation room with fireplace, furnace and laundry room. This house is completely air conditioned and is mechanically ventilated, assuring year 'round comfort and cleanliness.

The quiet zone has three bedrooms, one of which doubles as a study, and a large bath. Each bedroom has wardrobe-type closets with sliding doors. The walls of the study are finished in 1x8-inch ash boards laid horizontally. The bathroom has a 14-foot built-in L-shaped lavatory-vanity combination, a tub enclosure of plate glass and a glass-enclosed water closet. Walls and floor are covered with textured clay tile.

Placed on a poured concrete foundation and footings, the house has exterior walls of face brick. The recessed area on street front is faced with vertical redwood boards of random width. All framing members are wood, including studs, joists and rafters. White asphalt shingles cover the roof of the house.

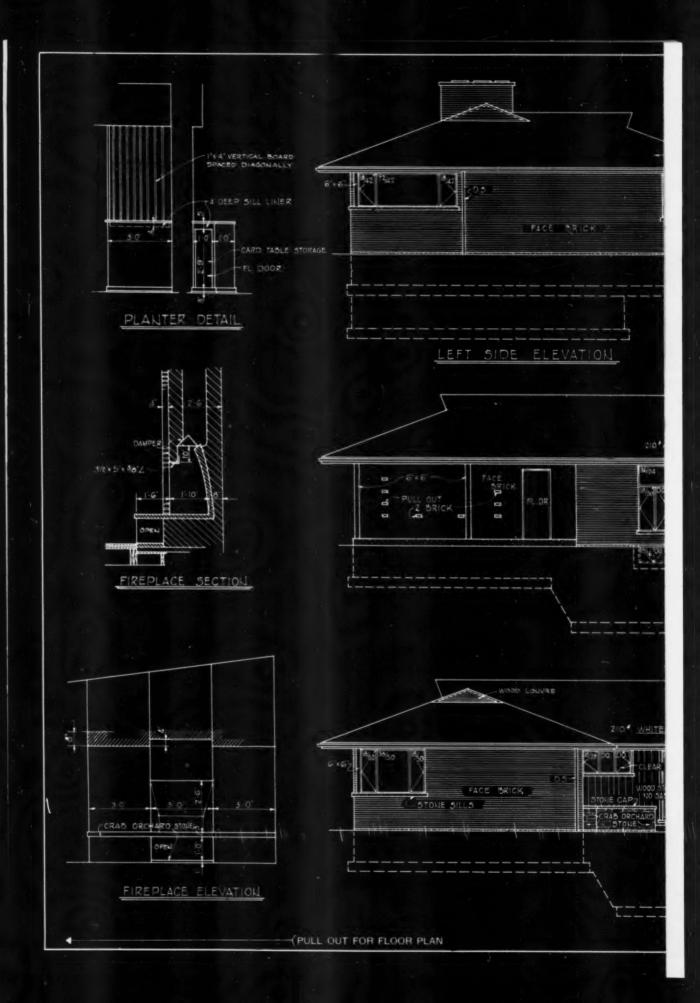
BRAND NAME PRODUCTS USED

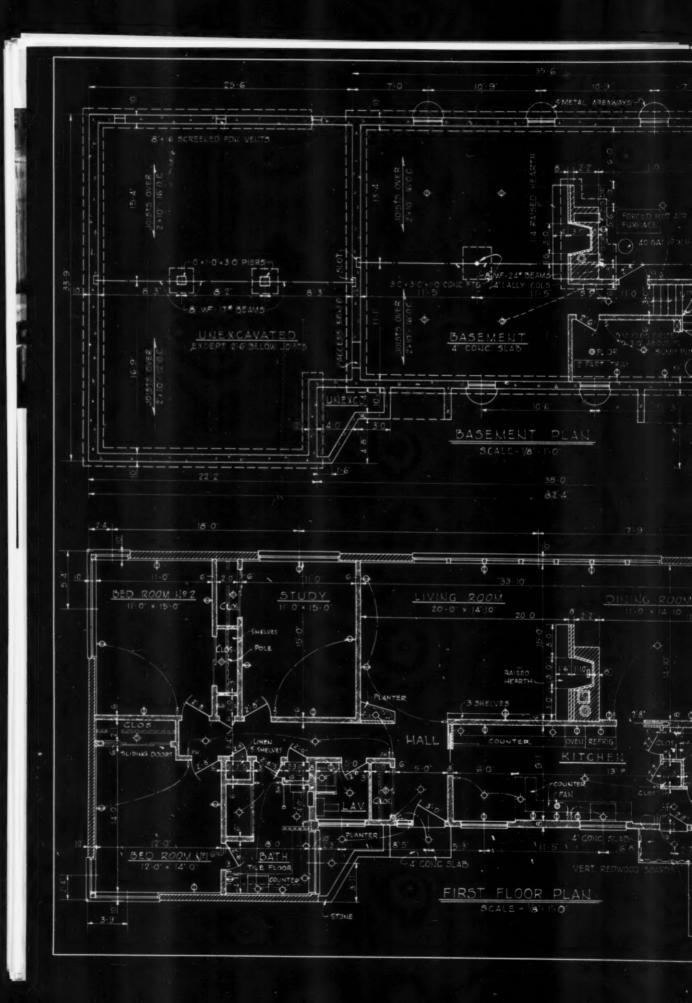
Armstrong Cork tile
Barrett asphalt shingles
Bryant gas-fired furnace
Bryant air conditioning unit
Crane plumbing fixtures
Flor-Ever vinyl asphalt tile
General Electric Disposall
Formica counters
Hall-Mack both accessories
Johns-Manville Rockwool
insulation
Kennatrack sliding door
hardware
Libby-Owens-Ford Thermopane

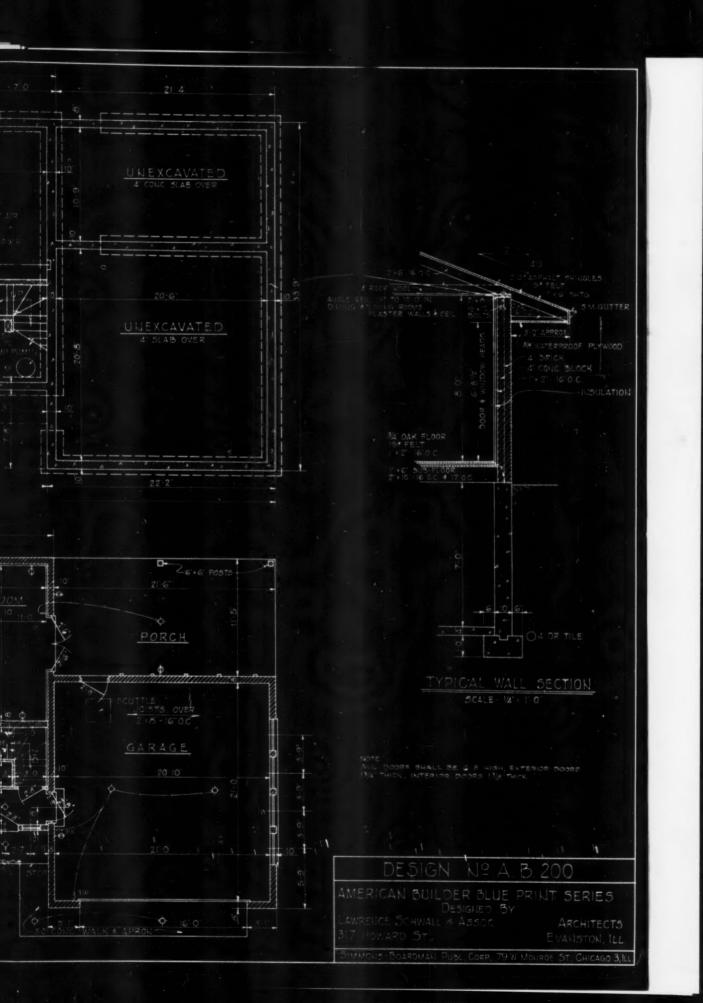
McKee garage door
Minneapolis-Honeywell
controls
Morgan doors
NuTone kitchen fan
Pratt & Lambert paints
Presteline oven and range
Reynolds insulation
Rheem water heater
Schlage hardware
Sterling cabinet hardware
Thorn aluminum windows
Versons & Kerling recessed
lighting fixtures

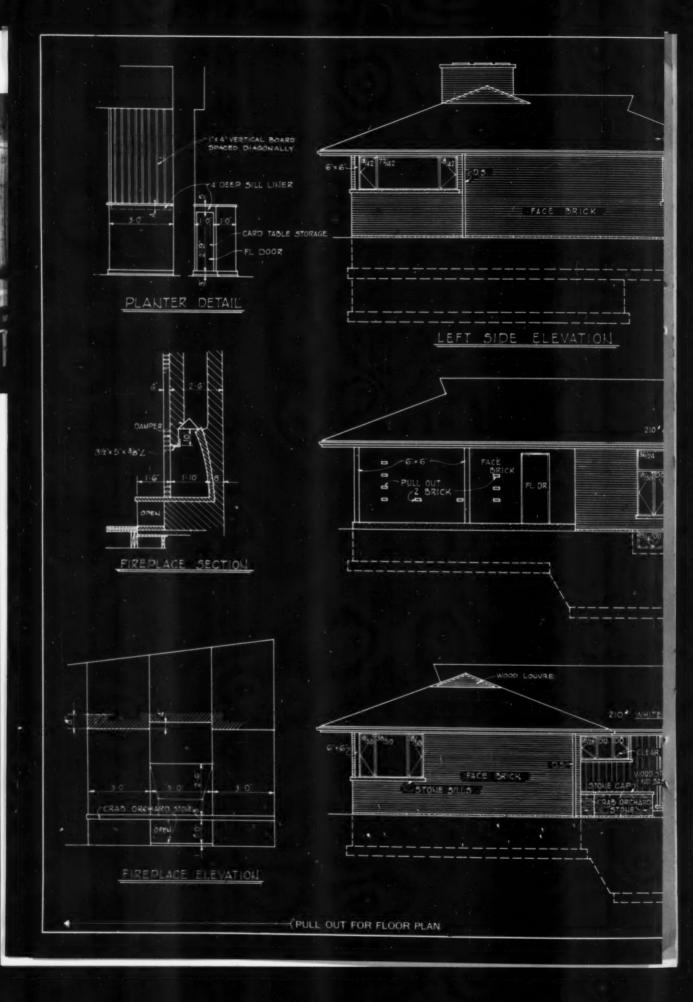
See Gatefold Blueprint for complete working drawings —quantity list of materials

For complete one-quarter-inch working plans of this house, write American Builder Home Plan Service, 79 West Monroe Street, Chicago 3, Illinois.









Quantity List of Materials

For American Builder Blueprint House No. AB 200

Lawrence Schwall & Assoc., Architects

General Information
House — Type masonry
Area
Cube 29,410 cu. ft.
Average height taken for cube russ 17 feet Garage — Area
Garage — Area
Cube
Height taken for cobe was it feet
Porch — Area
Excavating
Trench for foundation
Chimney and column footings 4
Excavation for basement
Cement Work
Foundations
Concrete work
Thickness 4"
Sidewalks
Anchor bolts
Waterproofing (basement only) 850 sq. ft.
Foundation vents
Metal areaways 5
Metal basement sash
Masonry
Type brick and stone
Walls — Brick
Stone
Window sills stone
Chimney brick Flue lining 12"x12" — 32 lin. ft. 10" diameter round — 20 lin. ft.
rive lining
Cap concrete
Concrete
Fireplaces — Crab Orchard Stone
Iron Work
Structural
Lally columns
Miscellaneous
Lintels for basement windows

Millwork
Windows — Type fixed and casement
Material — Fixed wood
Material — Fixed wood Casement
Material — Fixed wood Casement aluminum Windows — Glazed, including trim
Material — Fixed wood Casement aluminum Windows — Glazed, including trim Fixed, wood set in stops 5 — 35"x75"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 — 35"x75" Fixed, wood set in stops 5 — 36"x24"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim Fixed, wood set in stops 5 — 35"x75" 4 — 36"x24" 1 — 12"x77"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 — 35"x75" Fixed, wood set in stops 5 — 35"x75" 4 — 36"x24" 1 — 12"x77" Casement 4 — 18"x36"
Material — Fixed wood casement Casement aluminum Windows — Glazed, including trim 5 — 35"x75" Fixed, wood set in stops 5 — 35"x75" 4 — 36"x24" 1 — 12"x77" Casement 4 — 18"x36" 4 — 18"x42"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 — 35"x75" Fixed, wood set in stops 5 — 36"x24" 1 — 12"x77" 1 — 12"x77" Casement 4 — 18"x36" 4 — 18"x42" 13 — 18"x50"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim Fixed, wood set in stops 5 — 35"x75" 4 — 36"x24" 1 — 12"x77" Casement 4 — 18"x36" 4 — 18"x42" 13 — 18"x50" 7 — 18"x28"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 — 35"x75" Fixed, wood set in stops 5 — 35"x75" 4 — 36"x24" 1 — 12"x77" Casement 4 — 18"x36" 4 — 18"x42" 13 — 18"x50" 7 — 18"x28" 7 — 18"x28" Fixed picture windows 2 — 36"x24"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 Fixed, wood set in stops 5 4 36"x24" 1 12"x77" Casement 4 4 18"x42" 13 18"x50" 7 18"x28" Fixed picture windows 2 1 38"x50"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 — 35"x75" Fixed, wood set in stops 5 — 36"x24" 1 — 12"x77" 1 — 12"x77" Casement 4 — 18"x36" 4 — 18"x42" 13 — 18"x50" 7 — 18"x28" 7 — 18"x28" Fixed picture windows 2 — 36"x24" 1 — 38"x50" 1 — 54"x50"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 — 35"x75" Fixed, wood set in stops 5 — 35"x75" 4 — 36"x24" 1 — 12"x77" Casement 4 — 18"x36" 4 — 18"x42" 13 — 18"x50" 7 — 18"x28" 7 — 18"x28" Fixed picture windows 2 — 36"x24" 1 — 54"x50" 1 — 54"x50" 1 — 54"x50" 1 — 72"x42"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 Fixed, wood set in stops 5 4 36"x24" 1 12"x77" Casement 4 4 18"x36" 4 18"x42" 13 18"x50" 7 18"x28" Fixed picture windows 2 2 36"x24" 1 38"x50" 1 54"x50" 1 72"x42" Exterior doors — Material wood
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 Fixed, wood set in stops 5 4 36"x24" 1 12"x77" Casement 4 4 18"x36" 4 18"x42" 13 18"x50" 7 18"x28" Fixed picture windows 2 2 36"x24" 1 38"x50" 1 54"x50" 1 72"x42" Exterior doors — Material wood
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 Fixed, wood set in stops 5 4 36"x24" 1 12"x77" Casement 4 4 18"x42" 3 18"x50" 7 18"x28" Fixed picture windows 2 2 36"x24" 1 38"x50" 1 54"x50" 1 72"x42" Exterior doors — Material wood 3 2 1 3"0"x6"8"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 Fixed, wood set in stops 5 4 36"x24" 1 12"x77" Casement 4 4 18"x42" 3 18"x50" 7 18"x28" Fixed picture windows 2 2 36"x24" 1 38"x50" 1 54"x50" 1 72"x42" Exterior doors — Material wood 3 2 1 3"0"x6"8"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 Fixed, wood set in stops 5 4 36"x24" 1 12"x77" Casement 4 4 18"x36" 4 18"x36" 7 18"x28" 7 18"x28" Fixed picture windows 2 2 36"x24" 1 38"x50" 1 54"x50" 1 72"x42" Exterior doors — Material wood 3 2'8"x6'8" 1 30"x6'8" French doors 2 Garage door — upward acting 1 1 16"0"x7"0"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 Fixed, wood set in stops 5 4 36"x24" 1 - 12"x77" Casement 4 4 18"x36" 4 18"x50" 7 18"x28" Fixed picture windows 2 2 36"x24" 1 -38"x50" 1 54"x50" 1 -72"x42" Exterior doors — Material 3 2 28"x6'8" 1 30"x6'8" French doors 2 Garage door — upward acting 1 Exterior millwork
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 Fixed, wood set in stops 5 4 36"x24" 1 12"x77" Casement 4 4 18"x42" 13 18"x50" 7 18"x28" Fixed picture windows 2 2 36"x24" 1 38"x50" 1 38"x50" 1 72"x42" Exterior doors — Material wood 3 2'8"x6'8" 1 30"x6'8" French doors 2 Garage door — upward acting 1 1 16'0"x7'0" Exterior millwork 1 Louvers 4
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 Fixed, wood set in stops 5 4 36"x24" 1 - 12"x77" Casement 4 4 18"x36" 4 18"x36" 7 18"x28" Fixed picture windows 2 2 36"x24" 1 38"x50" 1 54"x50" 1 72"x42" Exterior doors — Material wood 3 2"8"x6'8" 1 30"x6'8" French doors 2 Garage door — upward acting 1 Louvers 4 Interior doors, including jambs and trim 4
Material — Fixed Wood
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 Fixed, wood set in stops 5 4 36"x24" 1 12"x77" Casement 4 4 18"x42" 13 18"x50" 7 18"x28" Fixed picture windows 2 2 36"x24" 1 33"x50" 1 54"x50" 1 72"x42" Exterior doors — Malerial wood 5 2 6 76"x6"s" 6 20"x6"s" 6 20"x6"s" 6 20"x6"s"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 Fixed, wood set in stops 5 4 36"x24" 1 12"x77" Casement 4 4 18"x36" 4 18"x36" 7 18"x28" 7 18"x28" 7 18"x28" 1 36"x24" 1 38"x50" 1 54"x50" 1 72"x42" Exterior doors — Material wood 3 2'8"x6'8" 1 30"x6'8" French doors 2 Garage door — upward acting 1 1 16"0"x7"0" Exterior millwork 4 Louvers 4 Interior doors, including jambs and trim 1 18"x6'8" 2 2"x6'8" 6 2"x6'8" 6 2"x6'8"
Material — Fixed wood Casement aluminum Windows — Glazed, including trim 5 Fixed, wood set in stops 5 4 36"x24" 1 12"x77" Casement 4 4 18"x42" 13 18"x50" 7 18"x28" Fixed picture windows 2 2 36"x24" 1 33"x50" 1 54"x50" 1 72"x42" Exterior doors — Malerial wood 5 2 6 76"x6"s" 6 20"x6"s" 6 20"x6"s" 6 20"x6"s"

Special interior doors	
Sets of sliding doors (included above Special interior millwork	ve) 6
Kitchen cases	Living room shelves
Bathroom cases and partitions	Planter
Carpent	•
Beams and girders p	osts — 2 — 6"x 6" — 8'0"
Joists	28 — 2"x10" — 26'0" 20 — 2"x10" — 18'0"
	22 — 2"x10" — 16'0"
Bridging	
Bridging	230 — 2"x4" — 8'0"
	2"x8" — 200 lin. ft. 2"x4" — 700 lin. ft.
Calling Inter-	2"x4" — 700 lin. ft.
Ceiling joists	26 — 2"x 8" — 22'0" 32 — 2"x 6" — 26'0" 18 — 2"x 6" — 18'0"
	18 — 2"x 6" — 18'0"
	18 - 2"x 6" - 16'0"
Roof rafters	100 - 2"x 6" - 18'0"
	64 — 2"x 6" — 16'0" 4 — 2"x 8" — 26'0"
	4 — 2"x 8" — 26'0" 6 — 2"x 8" — 18'0"
	2"x8" — 84 lin. ft.
Framing lintels	2 - 2"x10" - 12'0"
	3 - 2"x12" - 18'0"
	4 - 2"x 8" - 10'0"
Subfloor	
Roof sheathing	
Sidewall sheathing	150 — 8'0" — 200 lin ft
Grounds depend on interior wall	material, jambs and trim
Carpenter stairs	2 - 2"x12" - 16'0"
	14 — 2"×10" — 3'0"
	13 — 1"x 8" — 3'0"
Flooring — Hardwood a	red to cover — 1,220 sq. ft.
Softwood	1"x2" — 1.400 lin. ft.
Exterior material	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,
Soffits	200 — 2"x2" — 3'0"
Eaves	3/6" plywood — 2,000 sq. ft.
Porches	instruded electrics.
Insulation — Ceiling	
Sidewall	
Sheet Mo	nam!
Gutters	
Downspouts	
Flashing	
Roofin	
	•
Type 210 lb. as	
Area	38 squares
Interior V	
Area to be covered	5,900 sq. ft.

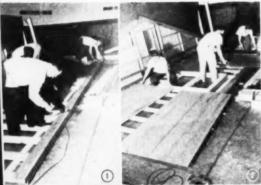
■ This quantity list will be subject to variation depending on the common practices in various sections and municipalities of the country, the techniques of individual builders, the types of materials available locally and cost factors. The list published here is a suggested one, complete enough so that it can be used in arriving at a reasonably accurate estimate of the quantities and cost of materials that will be required to complete the structure. It was prepared by experts at the Edward Hines Lumber Co., Chicago.

'how to do it' convention roundup

these cost saving techniques will work for '5 or 500 houses'



Andrew Place









LABOR and cost saving advantages of precutting and preassembly, "tilt-up" construction, roof trusses and storage walls were effectively emphasized during the NAHB convention by Andy Place and an eight-man crew from South Bend, Indiana.

A step-by-step "live performance" dramatized these advantages:

Precutting—greater accuracy; lower cutting cost through the use of assembly line production methods; better use of "scrap" lengths; more efficient use of "on-site" labor.

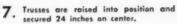
"Tilt-up" construction—quicker, easier and more accurate layout through the use of templates; materials can be held in position more easily; nailing is faster, easier; men can work more safely and efficiently, as compared to working on ladders and scaffolds; an estimated cost saving of 20 per cent.

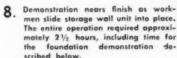
Roof trusses—stronger construction; greater flexibility in floor plan; can be preassembled, thus getting the house under roof more rapidly; provides a more level ceiling; permits finishing economies such as application of plasterboard to the single open room before partitions or storage walls are installed; in freezing weather, permits slab to be poured after house is under roof; provides large volume of storage in a dry area.

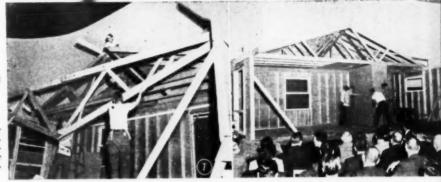
Storage walls—more rapid completion of house; savings in drywall finishing due to larger open areas and fewer corners; improved closet design with more accessible space; greater flexibility of living areas (bedrooms can be changed to meet family requirements).

Said Andy Place, "This system will work for 5 to 500 houses."

- Workmen assemble a 28-foot wall section. This operation is controlled by the
 use of two templates extending the full width of the panels. After chalk lines
 have been drawn on the floor of the working area for the necessary width,
 templates are placed between lines and approximately six inches from top
 and bottom plates. Templates are notched every 16 inches to receive studs.
- Panels of plywood sheathing are applied after studs, window and door assemblies are in place and nailed. Just before application of sheathing, wall section must be squared.
- 3. Template also is used for siding or shingles. Fabricated metal corners are used for both siding and shingles.
- Less than one-half hour after workmen started on wall section, it is tilted in place. Note template as workmen detach it from studs.
- Second section is tilted into place and workmen are locking the sections firmly together. Extensions of 2x6-inch topplate (one can be seen in foreground of photo No. 1) interlock as sections are brought together.
- 6. Two workmen assemble roof trusses in five minutes. Note use of automatic nut running device.







Place uses standard steel curb forms for his foundation

Simulating a corner section of the pier and beam construction used in their South Bend operations, Place and his crew demonstrate how the job can be done with the use of standard highway curb forms. "These forms can be used for 400 to 500 houses by just keeping them clean." stated Place.

- This illustration shows workmen placing reinforced steel around perimeter (grade beam). Operations preliminary to this step include leveling of the site; placing of stakes around the perimeter by the engineer (see photo 1); digging of pier holes around the perimeter with 16-inch augur on tractor; and trenching for placement of concrete forms.
- 2. Steel forms for outside of grade beam have been set and workmen are securing forms with steel stakes.
- 3. Rear view of outside forms in position. Note steel stakes and bracing at
- 4. Forms for inside of grade beam are of wood. They are secured by steel stakes, thus assuring rigid four-inch separation between outside and inside forms.
- Perimeter insulation (two-inch fiber glass in sheet form) is placed and wrapped with Visking vapor barrier. Insulation is installed against the inside form and also flat, extending two feet into center of slab area. Place subgrades eight inches from top of form. Simulated layer seen in photo is sand fill.
- 6. Here workmen complete installation of perimeter heat duct (vitrofied tile). Although not shown in this sectional mackup, plenum chamber for heating system is placed in position at this time, as are simple metal forms for heat duct outlets. Vapor barrier, which had been folded back to permit installation of ducts, is then placed over entire slab area, followed by 6x6-inch steel mesh. (Mesh is raised when concrete is poured to assure its being an integral part of the slab.)









'how to do it' convention roundup



Ringmaster Earl "Flat-Top" Smith

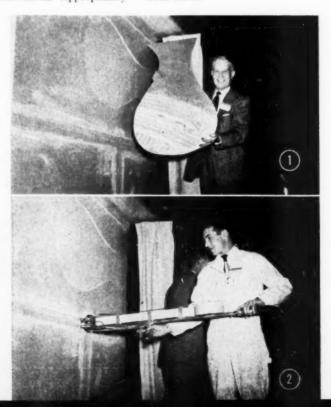
seven trade groups stage unprecedented seven-ring demonstration circus

SPARKED by NAHB Construction Committee Chairman Earl W. Smith and Construction Department Director Leonard B. Haeger, seven trade associations joined hands to sponsor and conduct an unprecedented series of demonstrations. These ran concurrently on seven stages in the Grand Ballroom of the Conrad Hilton on the last day of the convention. Appropriately

named the "How To Do It" Circus, each trade group staged five complete 30-minute demonstrations during a three-hour morning session, returning in the afternoon until all questions were answered. On these and the following pages are picture and word condensations of the "how it's done" message each association put across during its half-hour show.

how to finish drywall — The Gypsum Association

- Cutaway section of second ply of gypsum wallboard. Special adhesive on back of this face layer is used to laminate face layer to first ply.
- First step in concealing and reinforcing drywall joints, is the taping of horizontal wallboard joints with this taping tool.



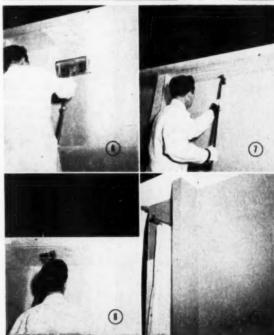






- 4. Mechanic applies tape to outside corner. Tool can tape all kinds of corners and joints—inside or outside corners, regardless of angle; recessed or flat edge joints. Taping device applies correct length of tape where you want it, and with adequate cement to properly imbed it.
- 5. Mechanic finishes horizontal wallboard joint with 12-inch hand finisher.
- 6. Cement is feathered out for an even, smooth finish, as mechanic applies second coat with hand finishing device.
- Corner finisher is used after corner roller imbeds and squares corners. Finisher plows excess cement back over tape evenly and smoothly.
- 8. Mechanic spots wall and ceiling nails with special nail spotting tool.
- The finished drywall. (Ames taping tools, available on lease only, were used for this demonstration. This particular set of tools has been used in taping and finishing more than 60,000,000 square feet of wallboard.)











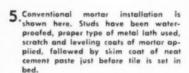


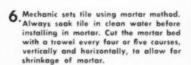


'how to do it' convention roundup

how to get better clay tile installations—The Tile Council

- 1. Shown are two of three basic types of clay tile. Three types are: (a) $4 \frac{1}{4} \times 4 \frac{1}{4}$ inch glazed, square; (b) ceramic mosaic; (c) quary.
- 7. Mechanic sets tile using adhesive method.
- 2. Good tile work begins with the carpenter. He should select straight and true studs. These should be braced midway in their height with 2x4 herringbone bridging cut between 15 and 30 degrees with the horizontal.
- 8. Mechanic applies white grout to joints between tile.
- Good tile work also depends on the plumber. He should always use tub hangers to avoid tub settlement and opening of cracks where tub meets wall.
- 9. Here are ingredients for proper 1:1:4 mix: one bag of Portland cement, one bag of lime, and 13 12-quart buckets of clean, damp sand.
- 4 See that all pipe connections are brought out at least 1 $\frac{1}{2}$ inches from stud line. This assures adequate tolerance for fittings.















how to use dry finishing materials—Insulation Board Institute

ILLUSRATION above shows workman installing 12x12-inch ceiling tile with adhesive. In using this method, care should be taken to apply the adhesive in spots or dabs two inches in diameter, ½- to ½-inch thick, one in each corner of the square tileboard. For larger rectangular tileboard, use two or more additional spots.

In corner photo above, random width plank is applied on furring strips over framing members. For typical installation, furring strips should be at right angles to plank on nine-inch centers up to a height of five feet, and 12-inch or 16-inch centers above this height.

Illustration at right shows appli-

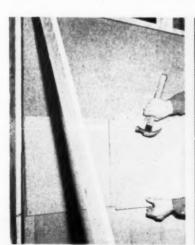
cation of 4x8-foot building board direct to framing members. Framing should be installed in the usual manner on 12- or 16-inch centers. Headers should be cut in between framing members at the ends of the insulation boards to provide a nailing base, and also in back of chair rails and all other heavy moldings. Insulation boards should be of sufficient length to completely span between sills and plates or other structural members.

At right below, mechanic applies lath over framing members. Lath should be applied with long edges at right angles to the framing or furring strips.

Photo at left below illustrates use



of newly developed shingle backer. Wood shake shingles are applied directly to 25/32-inch sheathing with the use of the shingle backer and a special 2-inch galvanized annular-grooved nail. The shingle, along with a wood lath strip, can be used to apply asbestos-cement shingles to sheathing.





MARCH 1954









'how to do it' convention roundup

solder joints for copper tubing— Copper & Brass Research Institute

There are nine important steps in properly making a solder joint for copper tubing. Four of the steps are illustrated in the photos at left.

- (Upper left) Cut tube square and to exact length. If it isn't cut square, it will not seat properly against the shoulder. If you cut too short, you steal part of your socket depth and the joint is weekened.
- 2. (Upper right) Remove burrs or irregularities.
- (Lower left) Clean tube end and fitting. This removes oxides which prevent the solder from bonding with the copper. It is the most important step in the entire operation.
- 4. (Lower right) Flux tube end and fitting. This removes residual axide, prevents further oxidation during heating; and floats out dissolved oxide ahead of the solder, thus presenting a clean surface to the solder at all times.
- 5. Assemble tube into fitting.
- Heat the joint until metal is hot enough to melt solder. This
 assures capillary action and good bonding.
- Apply solder to joint. If it isn't hot enough, mechanic again applies heat to the joint, not the solder.
- 8. Clean excess flux and solder from tube and fitting.
- 9. Inspect joint for complete ring of solder.

how to install kitchen cabinets — Steel Kitchen Cabinet Mfgs. Ass'n.

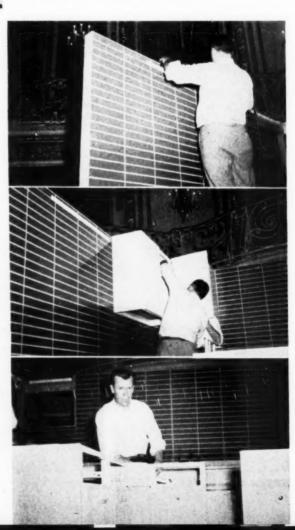
THE PROPER USE of hanger bars and the systematic placement of wall and base kitchen cabinet units were detailed in this demonstration.

In the top illustration at right the mechanic is installing hanger bars for wall cabinets. These are placed on a level line at the height recommended by the manufacturer. (When using hanger bars follow instructions of the maker carefully, it was emphasized.)

Hanger bars are not necessary, however. Wall cabinets can be anchored with wood screws regardless of wall construction. This is particularly true in remodeling. For new construction, metal wall cabinets also can be installed easily and solidly by anchoring directly into ground strips.

Center illustration shows installation of corner wall cabinet on hanger bars. Placement should always start in corner, working outward in both directions for additional units. To simplify the installation of wall cabinets, they should be positioned before the soffit is completed.

In the bottom photo workman is assembling the corner base section unit. He does this in the center of the kitchen floor and, after assembly is complete, he slides the unit into position. Adjoining units are then placed in position, again working outward from the corner.



KEY TO FASTENERS

A. ES/Nail No. 11

1 1/a-inch aluminum alloy nail for ply-

1 3/4-inch multiple-thread barbed aluminum nail

1 1/2-inch multiple-thread barbed alumi-

E.G. Loc-Nail

Flintkote "hook nail" Hook-headed nail for metal channels

21/4-inch twist noil (tin plated copper)



Mechanic installs shingle using "hook nail," a recent development of The Flintkote Company

how to apply asbestos shingles— **Ashestos Cement Products Association**

Some of the newer fasteners and techniques for applying asbestos cement siding shingles to non-wood sheathing are illustrated and described on this page.

1/2-inch gypsum board-Two selfclinching nails for use with 1/2-inch gypsum board are the ES Nail No. 11 and the E. G. Loc-Nail. Both nails secure the shingles to gypsum board by automatically clinching immediately behind the board.

Insulating board sheathing-The E. G. Loc-Nail also is made in proper lengths for 1/2-inch and 25/32inch insulating board sheathing. ES/Products, Inc., maker of the ES Nail No. 11, is developing a nail for 25/22-inch sheathing of this type. It will be known as ES Nail No. 13 and will be available in June, 1954. The recently developed Flintkote "hook nail" is used for shingles which have four head nail holes, instead of the usual three holes at the bottom. Flintkote and other manufacturers will supply shingles so punched on order. The "hook nail" fasteners, for use with 1/2-inch or 25/32-inch insulating sheathing, are tin-coated. red copper nails. They are driven down at a slant and the shingles in the course above fit into the "hooks". Since part of the hook comes between the overlapped shingles, an accentuated shadow line is produced.

16ths and thicker plywood-A 11/8-inch aluminum alloy nail is available for use over plywood sheathing. Point, barbing and other features are planned to give it good holding power. It is usable on all plywood sheathing 5/16-inch and thicker. It can be used with lumber sheathing as well.

21/4-inch twist nail-This nail. made of hardened copper and tin plated, can be used over any nonwood sheathing or nailing base. The nail is driven through the sheathing and clinched from behind with a "twister tool," similar to a forked screw driver. This twisting draws the shingle tight and forms a lock which holds it in place. Suitable for all thicknesses of gypsum and insulating board sheathing, they also can be driven into studs after a portion of the shank is cut off.

13/4-inch multiple-thread barbed nail-This aluminum nail was developed for remodeling work in fastening shingles to old wood siding. The multiple-thread shank is designed for extra holding power.

Metal channels-Several types of metal channels are now available. The channel strips fit over the head edge of the under-course shingles. and are held in place with "hook headed" nails driven into the studs, one nail to each stud. The nail is Lshaped at the head and the "hook" clamps the strip to the top of the shingle. Some channels have flanges which extend upward flush with the sheathing, and are nailed through that flange for extra rigidity. The butts of shingles in the succeeding course engage with, and are supported by the channel. The headlap in this method is reduced to one inch from the customary 11/2 inches.

"Horseleathers" method-The "horsefeather," or beveled furring strip, is a piece of wood not less than 31/2 inches in width and not less than 3/8 inch thick at the butt. It is nailed securely to the studs, two nails to the stud, and laps 11/4 inches over the top of the shingle. The next shingle is applied so that its butt extends 1/4 inch below the base of the nailing strip, nailed through the face nail holes with standard face nails,



Channel strips fit over head edge of under-course shingles; are held in place with "hook-headed" nails



Here workman demonstrates "horsefeather" method for applying asbestos cement siding shingles

BIG BUILDER

sets pace for housing values in 1954

years of effort to deliver the most house for the least money."—
Bill Levitt

"The 1954 'Country Clubber' represents the ultimate in our many

Levitt "Country Clubber" will probably be America's biggest housing value news in 1954

Levitt does it again

1954 "Country Clubber" Has All This for \$15,500:

- 2,000 square feet of finished living area—1,200 on main floor and 800 on second floor.
- Two complete baths—each features double sliding mirror medicine chest and wall tile.
- Complete landscaping—over a dozen trees, 43 assorted shrubs and lawn.
- 4. Double glazing—panel window system eliminates need for storm sash.
- Radiant heat—oil-fired boiler supplies hot water to coils imbedded in slab.

- 6. Dishwasher sink—six-foot double drainboard, stainless steel sink has built-in dishwasher.
- Automatic washer-dryer—combination washer-dryer unit is conveniently placed in kitchen.
- Stove and refrigerator—push button range with clock and timer, 11.2-cubic-foot automatic defrost refrigerator.
- 9. Double carport—built of steel beams to eliminate bulky look.
- 10. Outdoor living—a slate patio near kitchen for outdoor entertaining.

- Fireplace—two-way log-burning brick fireplace, includes screen and fireplace tools.
- 100x200-foot lot—fully improved streets; water, sewer, storm sewer are included.
- Planned community—community planning integrates neighborhoods as part of larger developments.
- 14. Recreation facilities—swimming pools, ball diamonds, playgrounds, parks—all part of Levittown, Pennsylvania.

BUYERS are ordering Levitt and Sons' "Country Clubber" now, even though the first owners will not move into one of the nation's biggest housing values until next September.

This "Country Clubber" is big news. It costs less and has more square feet of living area than the previous Levitt model.

On the drawing boards a year, this house was planned to offer maximum amount of usable space for the home owner's dollar—major requirement for the '54 Levitt model. It is a house of 2,000 square feet with many flexibility features. It can have from two to five bedrooms, and the flexibility is such that a sixth can be added later by the owner with only the construction of a partition.

But best of all, this house provides ample living area for a large family. There is no sacrifice of living space in order to add more bedroom area.

The Levitt selling model has a floor layout designed to suit the average family with a moderate income. The model has three bedrooms and enough extras to tempt most buyers.

It features a living-dining room combination plus a large kitchen. The ground floor also has a "garden

(Continued on page 92)



2.000 square feet of living area on two floors point to the growing trend of off ground-level living areas

(Continued from page 91)

room," new to the housing field, with an exterior wall and interior partition of glass. Two bedrooms and bath complete the ground floor.

The second floor has a large recreation room, complete bath, and third bedroom.

But if this isn't housing news enough, add to the package a large double carport, a host of automatic kitchen appliances, extra large

The two-way fireplace is focal point in the large L-shaped living room. The room measures 22½ feet across the front





New to the housing industry in such α lowcost package is the "garden room" with
fenestration on both exterior and interior
walls. The room can be used as den, sewing
room or bedroom. The room measures 11 feet
by 10 feet 8 inches

20,000-square-foot lot, a well-planned community with direct suburban transportation service, and ample recreational facilities—all this for \$15,500.

Financing requires \$1,000 down for vets, \$3,100 for non-vets with carrying charges of \$74 per month. Included in the monthly tab are amortization, interest, insurance and taxes. There are no closing costs in Levitt financing plan, which forms another plus feature.



The "Country Clubber" is open-planned. Stairway to second floor is not hidden. Sliding screen guest closet is adjacent to entryway



The rest of the living area is the width of the house, measuring 25 feet





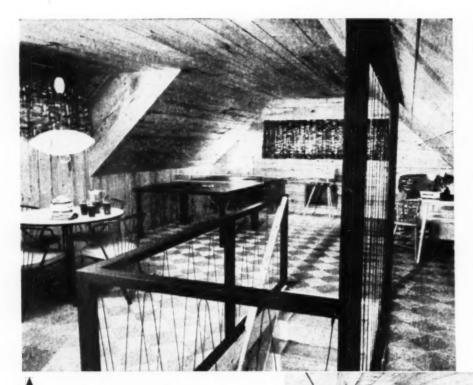
Bedrooms include shoulder-high windows that add extra wall space and privacy. Closets have sliding screen doors and are engineered for storage use





The plus-value kitchen is complete. Included in the sales price are stainless steel sink with electric dishwasher, stainless steel topped push-button automatic range, automatic defrost 11.2-cubic-foot refrigerator, automatic washer-dryer combination and broom closet. Room is 12x12 feet with plenty of eating space

There are two baths in the "Country Clubber." each containing extra large all-steel wall medicine cobinets with sliding door mirrors, porcelain tile walls

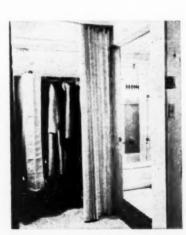


Second floor is completely finished in knotty pine, has recreation room, bath and third bedroom. If family requirements call for additional sleeping areas, recreation space can be made into two or three additional bedrooms

The pine paneled second floor area is 16 feet wide and runs the full length of the house. The enclosure shown houses the bath and walk-in closet. Beyond, is the third bedroom

The upstairs bedroom is 16 feet wide and is separated from recreation area by bathroom and walk-in closet





Adjacent to the bedroom is this large storage closet and bath, which has the same extras as the downstairs bathroom



a like ly story

about Ro-Way Overhead Type Doors

It's more than likely your clients will LIKE everything about Ro-Way Overhead Type Doors—because customer satisfaction is built right into every detail.

They'll LIKE the handsome Ro-Way styling—the clean lines that blend so well with any architectural design.

They'll LIKE the way Ro-Way doors are built of carefully selected west coast lumber . . . with mortise and tenon joints both glued and *steel* doweled for extra strength; muntins, rails and stiles precision squared for precision fit; sections rabbeted for weathertight joints; millwork drum and hand sanded for real smoothness.

They'll LIKE the way Ro-Way heavy gauge hardware

is both Parkerized and painted—after fabrication—for maximum rust resistance.

They'll LIKE the quiet ease of Ro-Way operation, assured by such outstanding features as friction-reducing Taper-Tite track coupled with Seal-A-Matic hinges; easy gliding, ball bearing Double-Thick tread rollers; and specially made springs with tension Power-Metered to the weight of each door.

What's more, you'll LIKE the client goodwill you earn by specifying Ro-Way—for every residential, commercial and industrial application. It isn't likely you'll ever regret it. So remember Ro-Way—for satisfaction all around.

there's a RO-Way for every doorway Overhead Type Doors

tionwide sales and installation service. See your classified telephone directory for nearest Ro-Way distributor,



ride the trend to faster sales

Fir Plywood built-ins are a definite sales-feature in any home you build

YOU'RE swimming with the tide when you offer buyers plenty of built-in storage space. Even modest homes can be lifted above the ordinary . . . given extra sales-appeal, extra livability with low-cost fir plywood built-ins. Use them in every part of the home—in living and dining rooms, bath, hall and utility area as well as kitchen and bedroom.

And fir plywood is the perfect material for built-ins. Big panels save time and labor. They're easy to cut, fit and fasten. Strong. Fir plywood takes abuse without splitting or chipping. Good looking.

Smooth real wood panels take any finish.

Play it safe. Your reputation's on the line with every home you sell. Specify only DFPA grade-trademarked fir plywood. "EXT-DFPA" for outdoor use, PlyPanel for interior finish, PlyScord for structural use. Other grades for other jobs.

EXT-DFPA°



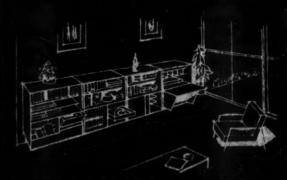


DOUGLAS FIR PLYWOOD ASSOCIATION, TACOMA 2 WASHINGTON

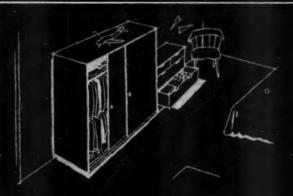
AND REMEMBER —
fir plywood cuts costs . . . for
wall and roof sheathing, subfloors,
underlayment, siding, exterior trim



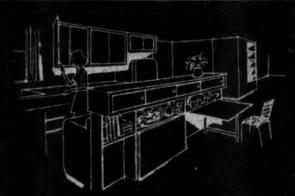
Combination dining bar, buffet and storage unit designed by Grosvenor Chapman, Washington, D.C.



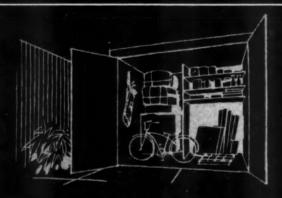
Shoulder-high sectional storage wall designed by Seymour R. Joseph, N.Y., N.Y.



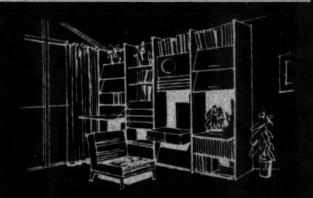
Fir plywood wardrobe closet and dresser designed by Bruce Walker, Cambridge, Mass.



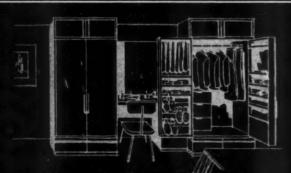
Half-high partition and storage unit designed by Paul Edward Tay, Long Beach, Calif.



Exterior fir plywood carport storage closet Designed by Bruce Walker, Cambridge, Mass.



Modular fir plywood storage wall designed by Project Designers & Planners, N.Y., N.Y.



Fir plywood shelf-door wardrobe closet designed by Edward Hanson, Stillwater, Minn.



MORE IDEAS FOR BUILT-INS—Send today for free "Portfolio of Architectural Designs for Built-Ins." Over 50 prize winning ideas from national architectural contest. (7 are shown on this page) Write (USA only) Douglas Fir Plywood Assoc. Dept. B. Tacoma, Washington.

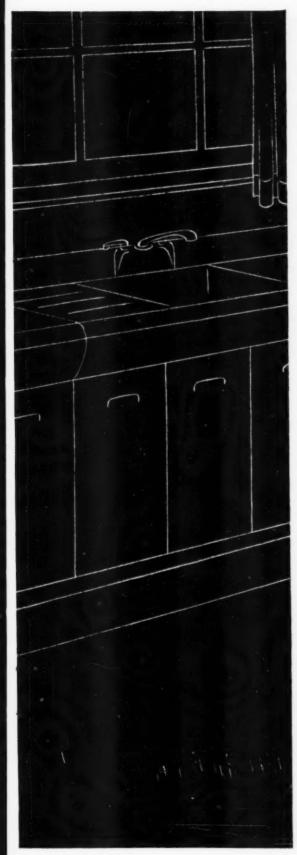
NEW

Suburban

NEW SPENCER SUBURBAN

THE OIL-FIRED BOILER BURNER UNIT

with the beauty and convenience of a kitchen appliance!



NEW PRODUCT

COMPLETE NEW HEATING UNIT

"code boiler" dependability . . . offers
easier installation and servicing

Spencer now offers a new ready-to-install oil-fired heating unit called the Suburban. This unit combines time-tested Spencer efficiency and durability with a new kind of beauty and ease of installation. It's equipped to supply year-round hot water, conforms to ASME and SBI codes, offers several unique advantages.

FITS IN ANYWHERE—the Spencer Suburban actually rivals modern kitchen appliances in adding beauty to kitchens or utility rooms. All parts are completely enclosed in a gleaming white enamel beauty jacket. Connections are easily concealed. And because the Suburban is completely insulated, it can be placed flush against metal appliances or wooden cabinets, or even set directly on a wooden floor. No special base is necessary.

EASIER TO INSTALL—just hook up electrical connections, oil and water lines, and smoke pipe. That's all.

EASIER TO SERVICE AND CLEAN—readily removed plate on top makes all fire tubes easily accessible. No need to disturb jacket or smoke pipe when cleaning this unit. Controls and all working parts can be reached from front for easier servicing.

This is the newest member of Spencer's Complete Line.



510 SQ. FT. NET SBI WATER RATING
DIMENSIONS—ONLY 211/2" x 321/2" X 56"





Spencer Heaters, Dept. AB-3-4, Lycoming-Spencer Division AVCO Manufacturing Corp., Williamsport, Pennsylvania

Dear Sirs: Please send additional information, including full specifications, on the new Spencer Suburban to:

Name_____Position___

Company

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The '54 Pall Pioneer Home

72 sq. ft. larger living room than most at price
27 ½ sq. ft. more closet space than most at price
30 sq. ft. larger kitchen, 43 ft. more kitchen shelving
extra powder room, folding door room for TV or 4th bedroom



Build homes that offer more . . . you'll sell more, profit more

There's no selling problem with this new P&H Home. Just let your prospects see it; let them compare with others at the price. That's all the selling you'll have to do. The new P&H Pioneer Home has full bath plus powder room, more than 1.100 sq. ft. of living space. And it has more new ideas, more selling features than any home you've seen at the price in years.

Site costs are lower, too, when you build P&H Homes. Homes arrive at site complete with hardware, millwork, glazing and trim, ready to go up in a day. You can build P&H Homes the year around, offer 2, 3 or 4 bedroom models with or without basements. Financing aid is available from a P&H subsidiary when local sources are limited.

See how risk-free and profitable home building can be

WRITE FOR DETAILS ON THE P&H BUILDER PROFIT PLAN NOW

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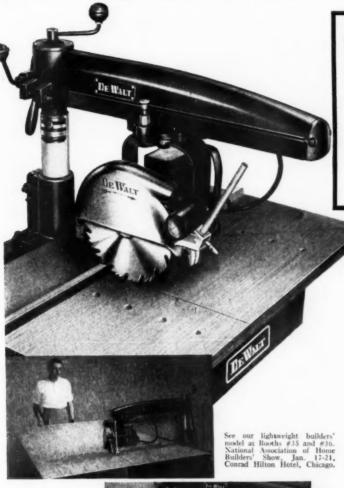


New Flexibility! 3-Way Dining Area Here's a real sales-closer in the '54 P&H Homes — a changeable dining area. The matchstick bamboo folding screen on a ceiling track makes dining area part of kitchen or living room, or open to both, in seconds.

Now sell homes to the lowcost market — profitably. Write for details on the new P & H minimum-cost Home, priced to sell at about \$6,000.



Here's your BIGGEST VALUE in power saws today...a portable, big-capacity **DeWalt** for only \$229 delivered!



RIPS TO CENTER OF 48" PANEL



DADOES AT ANY ANGLE



POWER SAWS

Subsidiary of

AMERICAN MACHINE & FOUNDRY COMPANY

New York

2 New Models for Small Builders

VALUE NO. I

Model MBC DE WALT 9" Saw Only \$229 Delivered

VALUE NO. 2

Model GWF DE WALT 10" Saw Only \$348 Delivered

Today...your best bet to reduce job costs and make bigger profits is a new portable DE WALT*...especially designed for small builders...priced low enough to pay for itself on the first house it helps build with savings these ways:

Big Capacity... new 9" saw cuts $2\frac{1}{2}$ " deep, 10" saw cuts 3" deep; both rip to center of 48" wide panels to give you ample capacity for house jobs.

Save Mondling...put DE WALT alongside the lumber pile and pre-cut all your framing from a planned cutting list.

Sove Marking...lay out one piece, set up your DE WALT and easily duplicate all cuts from ONE marking.

Save Fitting...DE WALT pre-cuts perfectly the first time, saves the added cost of fitting.

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Save Millwork Cost... DE WALT shapes, dadoes, etc., turns out millwork on the job... no more mill costs.

Save Repair Costs...direct drive DE WALT motor is grease-sealed for life...no brushes, no repairs to worry about.

Double Use...after framing carry DE WALT inside to "build in" those cozy extras that help sell houses.

Visit your nearby DE WALT dealer and pick up a low-cost DE WALT for your next job. It's easy to operate...easy to move around. And you get low-cost DE WALT PERFORMANCE that produces a better house for less money ... more profit to you! Write for complete DE WALT catalog.

De Walt Inc., Dept	AB-3-54. Lancaster,	Pa.	
Please send me power saws today	full details on the	BIGGEST	VALUE in
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Tests like these insure the quality of Kentile asphalt tile

A.I.A. 23-G

Because of scientific tests like these, every tile shipped has precision-straight edges and true right-angle corners. That means installation ease and economy. Further, Kentile's manufacturing techniques and tested ingredients mean that every tile is tougher, more durable, easier to clean...with lasting brilliance of color and uniformity of marbleization. But, get full details when you consult the Kentile Flooring Contractor, He's listed under FLOORS in the Classified Telephone Directory.

Specifications and Technical Data

INSTALLATION: Over any smooth, firm interior surface free from spring, oil, grease and foreign matter...over metal, wood, plywood, concrete, radiant heated concrete slab, concrete in contact with the earth; on or below grade.

THICKNESSES: Kentile is available in two gauges: 1/8" for residential and most commercial uses-3/16" for industrial use and where extra-heavy duty flooring is needed.

SIZES: Standard tile size is 9" x 9".

SPECIAL KENTILE: Greaseproof asphalt tile for industrial uses in a wide range of marbleized colors—extremely resistant to petroleum and cooking greases and oils, alcohols, alkalis and most acid solutions.

Approximate Installed Prices (per sq. ft.)

	1/8" Gauge	1/4" Gauge
KENTILE: A Colors	20¢	25¢
KENTILE: B Colors	25¢	30¢
KENTILE: C Colors	30¢	40¢
KENTILE: D Colors	35€	40¢
SPECIAL KENTILE	40¢	50e

These costs are based on a minimum area of 1,000 sq. ft. over concrete. Color groupings range from Group "A," the darkest solid colors... to Group "D," the lightest marbleized colors, Special Kentile is available in Regular and DeLuxe Colors.



The ability of Kentile's top-grade raw materials to flow properly during calendering is measured by a Mooney Viscometer.



This electronic Color-Eye records the shade of each Kentile color to help preserve uniformity of tone from one run to the next.



Trained technicians using Special Gauges check the length and width of Kentile to tolerances less than a thousandth of an inch.



Surface smoothness is checked by chemists who select tiles from every run and examine them under Binocular Microscopes.

Samples and literature available on request from nearest Kentile, Inc. office listed below. Ask about Kentile for WALL use, too. KENTILE

The Asphalt Tile of Enduring Beauty





Kentile is the floor your clients know and want...

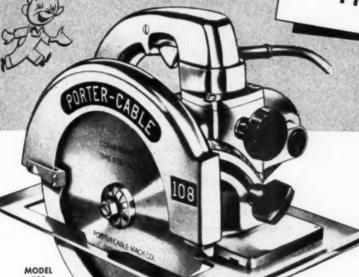
BACKED BY MORE FULL-COLOR ADVERTISING THAN ANY OTHER ASPHALT TILE FLOOR

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KENTILE, INC., 58 Second Avenue, Brooklyn 15, New York * 350 Fifth Avenue, New York 1, New York * 705 Architects Building, 17th and Sansom Streets, Philadelphia 3, Pennsylvania * 1211 NBC Building, Cleveland 14, Ohio * 900 Peachtree Street N. E., Atlanta 5, Georgia 2020 Walnut Street, Kansas City 8, Missouri * 4532 So. Kolin Avenue, Chicago 32, Illinois * 4501 Santa Fe Avenue, Los Angeles 58, California



Built for All-Day Sawing Deepest Cut of All Safer 4 Ways Specially Priced ...



"CONTRACTOR'S SPECIAL"



Rugged. All the power, speed Cuts Deeper. Full 81/4" blade through 1 x 10 pine in 1 second! parable saw



and stamina needed for long cuts 21/8" at 45"—deep enough rip cuts, fast cross cuts, comfor undressed 2 x 4's. 27/8" cut pound miters, etc. Actually cuts at 90° is deeper than any com-



Safer. (1) Exclusive kickproof clutch, (2) exclusive cam-action guard, (3) exclusive auxiliary front guard, (4) and extended base make sawing safer than ever.

Porter-Cable Quality Electric Tools

These are only the highlights of what's new in the Porter-Cable CONTRACTOR'S SPECIAL. Get the complete story-today -see your dealer or mail coupon for full information.

Manufacturers of GUILD and SPEEDMATIC Electric Tools

MARCH 1954

More advanced features than any other saw at any price!

- 1. MORE POWER-Larger motor with higher amperage provides 10% more power.
- 2. LIGHTER—New style casting shaves weight to 131/2 lbs.-means less muscle
- 3. KICK-PROOF CLUTCH-Eliminates dangerous kick-back when blade hits knots or hard spots.
- 4. BLADE GUARD LIFT LEVER-Permits you to pull guard back without risk while blade is spinning.
- 5. CAM-ACTION BLADE GUARD-Exclusive design (pat. pending) provides steady, full retraction-abolishes extra push required to overcome "hitching."
- 6. AUXILIARY FRONT GUARD Automatically covers exposed blade at front of saw when base is lowered for shal-
- 7. EXTENDED BASE-Lets you cut in either direction on either side when notching or trimming roof overhang.

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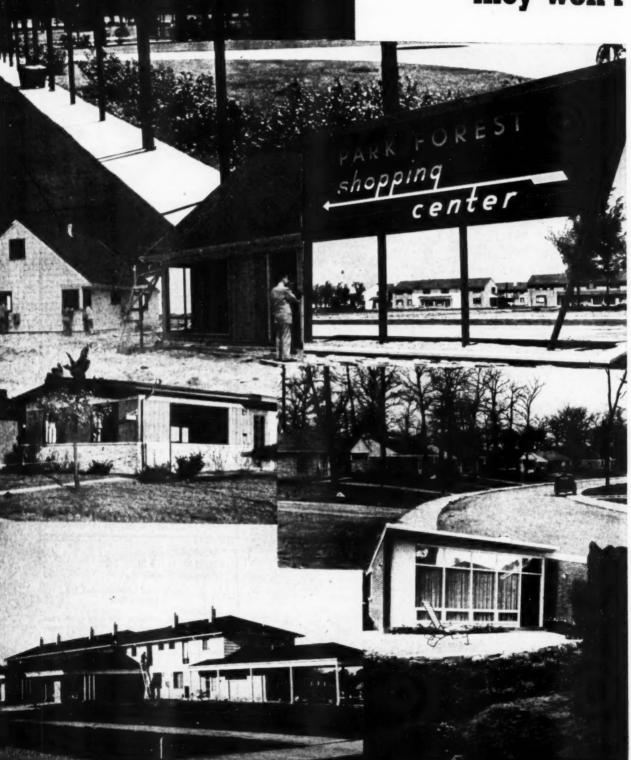
(In Canada, send to: Strongridge, Ltd., London, Ont.)

Gentlemen:

Please send complete information on your new "Contractor's Special"; also name of nearest dealer.

Address Zone

they won't



outgrow PARK FOREST!

Here's how Manilow builds new units to accommodate changing family needs

PARK FOREST does not want its citizens to search elsewhere for a luxury home if the family's fortunes rise. It does not want them to outgrow their planned community as to taste. It wants to be able to offer the growing family a kind of house that it needs and wants—in Park Forest!

Park Forest was originally planned as a park city offering housing to a large veteran group who needed inexpensive housing. Now, nearly six years later, it is two-thirds built. Its average male citizen is about 31 and is making around \$6,000 a year. Ninety per cent of the families there have children.

It is likely that the average Park Forester will increase his income in the future. This man and his family are very likely to want a nicer home as their fortunes rise. In a children's community, they may want more bedrooms.

For these reasons, American Community Builders, headed by Nathan Manilow, have built or are planning a series of projects like the following:

A luxury section in which anindividual can buy a lot and build a custom house of his choice. This area, called "Thorn Creek," is a wooded section south of Park Forest. Thorn Creek will be restricted for homes from \$20,000 to \$40,000.

▶ Houses with a custom look, which differ markedly from those homes built in Park Forest in the past. These new homes differ from the standard models built before in that they are of contemporary design. They are generally higher priced than those built in the past. These houses feature eight basically different designs selling at prices from \$14.350 to \$17.500.

\$14,350 to \$17,500.

Houses that will appeal to growing families. One of these homes is called the "growing home." It is designed for families with moderate budgets. The growing home is priced at \$10,995. It has a semifinished second floor. Owner can finish this himself. Another model recently built was also designed for the large family, but for one with a larger income. This house contains eight rooms. Five of the rooms are bedrooms. House sold for \$18,500.

Two large row houses, originally planned as co-ops. Now built and

Two large row houses, originally planned as co-ops. Now built and occupied, they represent luxury rental units called Illini Town Houses, Each of the Illini Town Houses contains 6 housing units one seven-room unit and five sixroom units.

Planned for the future and still on the drawing boards is what will be known as the Carroll Sweet Apartments. Preliminary thinking about the apartments suggests a two-story building containing 96 units. These apartments are thought of as predominantly one-room units with bath. Some will contain two rooms and bath. The one-room apartments will contain a bed alcove and a strip kitchen. Two-room apartments are envisioned as a full bedroom and a living room-kitchen. These apartments will give special consideration for older persons. Non-slip floors are planned, Bathtubs will be designed to eliminate hazard. The Carroll Sweet Apartments are planned to rent for about \$70 a month.

With a broad range of different kinds of homes to choose from, both as to price and as to design, a Park Forester will be able to find almost any kind of dwelling he may want to live in. By planning ahead, Nathan Manilow and his firm are creating a community that has a flexibility sensitive to family change.

CONTINUED





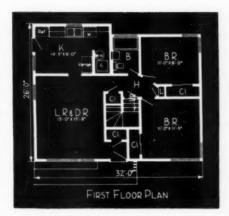
here is what Park Forest is doing—





Typical of the houses sold in Park Forest in the past is this two-bedroom model with one bath. Without garage it sold for \$13.025 to \$13.575, (upper left). One of the 546 new homes for sale in Park Forest (above), is contemporary in design. House has three bedrooms, two baths, carport and outdoor storage wall; meets trend toward larger families, higher incomes. House sells for \$16,800 to \$17,100.

Park Forest shopping center has been enlarged. Center is free of traffic. Parking areas surround stores which are placed in an island of parks and walks





Growing home is a frame story-and-a-half expansible unit. Exteriors were varied with different window treatments, use of redwood and colored asbestos shingle. First floor contains 800 square feet. Second floor contains 320 square feet, but is left unfinished. A staggered building line gives variety to street appearance of growing homes. Lots average 50x130. Automatic washer is included with purchase. The growing home sells for \$10,995.

for the economy-minded growing family—



Five bedroom house is ideal for a large family. The 42-A is brick and frame, looks very much like the "growing home," but is larger. The 42-A has a kitchen, dining room, living room, bath and two bedrooms downstairs. Three bedrooms and a bath are on the second floor. Two of these houses were built in Park Forest as an experiment to get reaction of the public. The house was popular and sold easily at about \$13,500.





MARCH 1954

houses from \$14,850 to \$17,200-

NEW houses for Park Forest now have at least three bedrooms. They show a marked departure in architectural style from those built in the past. This line of Park Forest homes is priced from \$14,350 to \$17,200, is available in eight basically different exterior treatments. Basementless and one-floored, they

have one, one-and-a-half, or two bathrooms.

Kitchens are equipped with steel cabinets, double sinks, automatic garbage disposal units. Floors are asphalt tile. Two-bath home sells for about \$16,050 to \$16,300, has a living room 12x20 feet. One-bath home is priced at \$14,850 to \$15,250, also

has a living room 12x20 feet. One of the models having a bath-and-one-half has a living room 12x20 feet, a dining room 12 feet 2 inches by 9 feet 2 inches and a kitchen with a snack bar. This home also has about 100 feet of attic storage and a disappearing stairway. This house sells for \$17,200,









rental units for \$150-\$175 a month—



THE row house takes on a new look in Park Forest. The Illini Town Houses recently built make up two structures that differ from the rental units built in the past. Each structure contains six dwelling units. Five of the units in each building have three bedrooms, one has four bedrooms. Each house has its own carport and storage closet.

Living-dining rooms have one wall of floor-to-ceiling windows. Kitchen is equipped with refrigerator, dryer, washer, disposal unit, exhaust fan and range, Each six-room unit rents for \$150 a month, Sevenroom unit rents for \$175 a month.

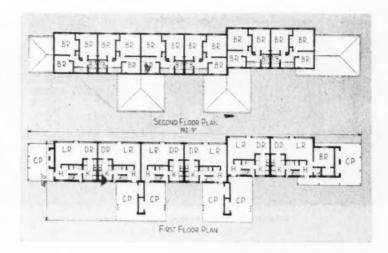
The Town Houses were developed from the experience American Com-

munity Builders gained after having built 3,010 rental apartments in the past. In those built previously, houses had a front door facing walks and parks. Back door was a service entrance facing parking and play areas for children. People tended to live to the rear of their homes, used the service entrance near their automobiles, seldom used the front door.

The Illini Town Houses differ in that circulation is controlled through entrance hall placed near carport and driveways. Traffic is channeled to important rooms through the foyer and the stairs to the second floor without the necessity of going through other rooms. Door in living-dining room is now logically of secondary importance.







for the young family with \$17,500 to spend—

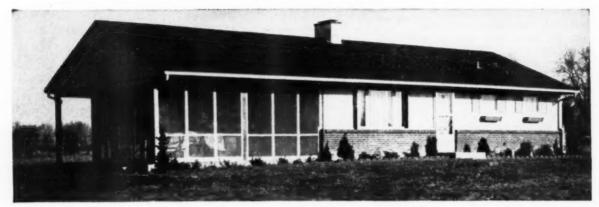
CONTEMPORARY in design, this six-room, three-bedroom home was designed especially for families with children. Sponsored by Parents' Magazine, house can be built on a site 60 feet wide allowing approximately five feet on each side of house to lot line. Built of brick, house has no basement. House has floor-to-ceiling window in living room glazed with insulating glass. Overhang protects against direct rays of sun.

Howe has asphalt tile throughout, perimeter heating. Year-round air conditioning can be made part of the heating system. Sleeping areas are in a wing by themselves, separated from living and dining areas by closets, bathrooms and kitchenutility areas. Two bedrooms for children can be separate rooms with a solid wall between or can be separated by a folding door which opens to provide a large play area.

Model shown here has carport and storage unit, contains 1,268 square feet within house. Carport adds 257 square feet. Storage unit contains 80 square feet. Fifteen other models similar to this one were built without carports and storage unit, sold for \$17,500 each. Plans show how house may be expanded later,







Screened-in parch adds living space, gives this Coronado a long, low, modern look.

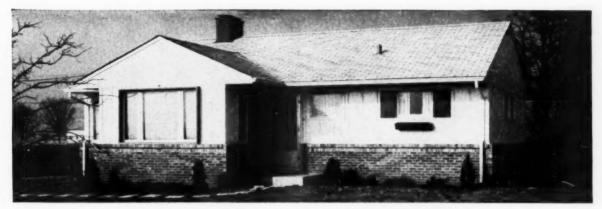
"I sold 25 Gunnison



Carport, fireplace, and brick wainscoting give this Gunnison Coronado a look of luxury. Basic model measures 24 ft. x 40 ft., has 3 bedrooms.

How he did it -

- 1. Good product at low price: Gunnison Homes.
- Good market potential for low-priced Gunnison Homes.
 Extra features add sales appeal.
- Trained erection and sales personnel. Every home under roof in 56 man hours. One experienced salesman devotes his full time to selling these homes; he can handle up to 100 homes a year.
- 4. Development plans approved by local planning commission. All Gunnison designs accepted by FHA and VA.
- Mortgage financing made easy with help of United States Steel Homes. Ninety-day construction financing also available.
- Newspaper advertising sells development as new planned community. National and local advertising by United States Steel Homes helps sales.



With brick wainscoting and other extras, this 3-bedroom Catalina home sold for \$13,200.

Homes in just 10 days"

says W. B. Eagles, Louisville, Ky.



• W. B. Eagles got his new Whipps Mill Village off to a rousing start last year: he built and sold 55 homes, and he developed the land for more than half of the 74 homes he will complete in 1954. Every home is individually styled, every one fits comfortably on a 60foot lot, and most important, every one is a Gunnison Home. Here is what Mr. Eagles told us:

"To make a housing development successful today, you have to have a sure supply of mortgage money. The prestige and active assistance of United States Steel Homes helped me to get good financing. Ten days after I had mortgage money I sold 25 homes: nearly half of all the homes I built last year.

"My Gunnison Homes are attractive, well built,

and easy to erect. An experienced 7-man crew can get the largest model under roof in just one 8-hour day."

At Whipps Mill Village, Mr. Eagles uses fireplaces, planting boxes, tile baths, brick wainscoting, electrical circuit breakers and other features to add variety and increase sales appeal. He does this and still sells the most luxurious model for only \$14,000.

United States Steel Homes, Inc. has helped make Whipps Mill Village a success by providing a large variety of excellent homes and by helping and advising the builder. Send the coupon for complete information about the many advantages of becoming a United States Steel Homes Dealer.

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Dept. AB-34, New Albany, Ind.	
My organization is capable	c

My organization is capable of building more than 15 conventional homes a year. Now I'm interested in what United States Steel Homes has to offer. Send me complete information, telling me what I will gain by building the products of United States Steel Homes, Inc.

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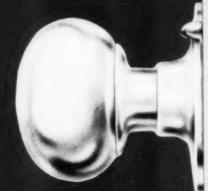


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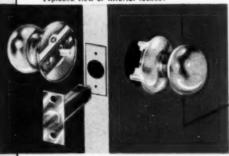


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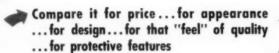


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2246AS Entrance door set without guarded latch bolt.

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2265AS Bathroom set (with emergency key).

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Beautiful appearance! In polished brass, bronze, aluminum, polished chrome for split finishes.

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Special installation tools!

Available is a strike indicator, centering tool, boring jig and mortising tool for face plate.





Phillips's Head Screws have a neater appearance, speedier installation.

ONLY HIGHEST QUALITY MATERIALS ARE USED IN ALIGNALOCKS

No die-cast parts. Concealed working parts made of pressure-formed metals. No easily cracked zinc die-cast parts.

Rugged steel case!

All working parts, except the cylinder, are in the rose. Knob contour is unbroken.

EASY ON THE LATCH...FIRM ON THE KNOB

TWO springs instead of one! Both springs work against knob action . . . only one works against latch.

Smooth, positive bolt and knob action!

Automatic unlocking! In bathroom or bedroom functions, if door is closed with the lock "on", it unlocks automatically. Won't remain locked if door accidentally closes.

Emergency unlocking! Even a paper clip, inserted in small hole in exterior rose of bathroom set. releases lock

All from one source! Sargent offers you a complete line of quality builders' hardware. One source...one invoice... unity of design and finish in all hardware required.

For complete information about the new line of Sargent AlignaLocks, and free literature for your prospective home buyers, see your supplier at once. Or write us.







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New York . NEW HAVEN, CONN. . Chicago

THE KITCHEN THAT HELPED SELL A CITY!



"American Kitchens No. 1 Selling Feature," says J. E. MERRION, Builder of \$25,000,000 Project, Hometown, Ill.

J. E. Merrion, builder of the Chicago suburban 2,000 home. 310 acre project, Hometown, Ill., labeled American

Kitchens the "kitchen that helped sell the city!" He said: "Every builder knows how important the kitchen is in a sale. But with American Kitchens, in every unit in Hometown, my selling job was far easier."

Ease and swiftness of installation-the savings on labor costs-the work-saving conveniences of American Kitchens as well as their beauty are the reasons why more and more builders are choosing American Kitchens over all other steel

kitchens or wood cabinets. Let us prove to you... how famous builders use better quality American Kitchens at lower prices to sell homes faster!

"Cabinets of steel for lasting appeal"





American Kitchens Division **AVCO Manufacturing Corp** Connersville, Ind., Dept. AB-34

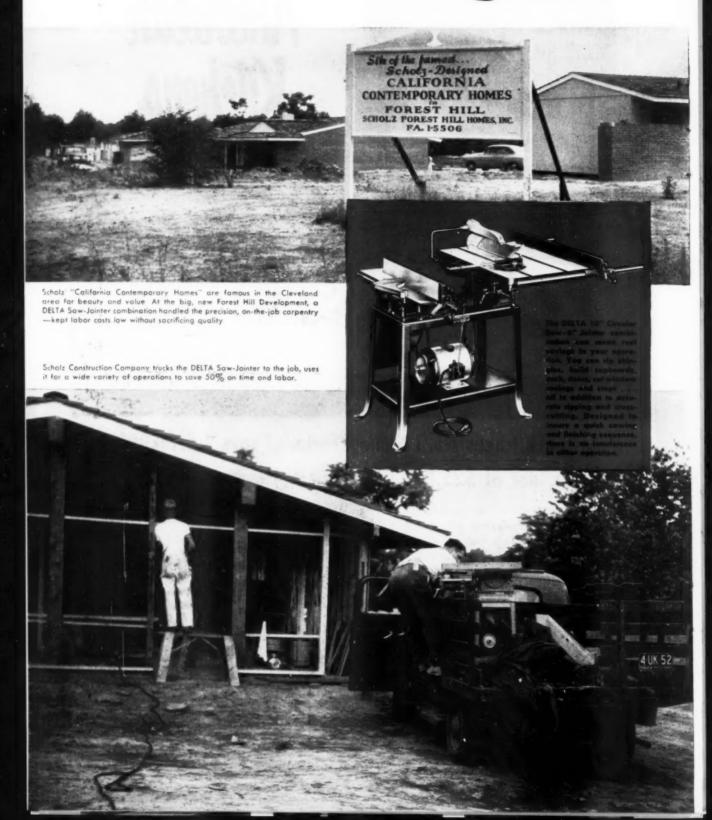
Please send me complete information about American Kitchens and your new Architects' and Builders' File.

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"You Save an Easy 50%



on Time and Labor" with a Rockwell-built DELTA Saw-Jointer Combination"

TWO YEARS AGO, Donald J. Scholz, Toledo, Ohio, Home Builder and Designer purchased his first DELTA Saw-Jointer combination. In constructing his well-known *California Contemporary Homes*, he found that his DELTA unit "paid for itself in six and one-half months."

William Decker, head carpenter for the Scholz organization, and a contractor in his own right, reports that "you save an easy 50% on time and labor in using

this DELTA Saw-Jointer on all kinds of finishing work. Not only that, but you know you're holding to precision requirements."

"I just slip it onto my truck and take it to the job. In a minute it's hooked into a power line, and we're really rolling."

A DELTA Saw-Jointer Combination, set up on your jobs, will turn out precision cut pieces faster, with less waste. You'll keep your carpenters busy nailing, not measuring and cutting!

With DELTA Power Tools, you can streamline your operations—keep labor costs and material waste to a minimum. You can build better homes in less time, attract today's selective buyers, and substantially increase your margin of profit. See your DELTA Dealer today, or send the coupon for full information.



Accurately cutting all framework for Scholz "California Contemporary Homes," a DELTA Saw-Jointer Combination "paid for itself in six and one-half months."

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DELTA QUALITY
MAKES THE DIFFERENCE

These *All Aluminum* Screens can change BYE...*into* <u>BUY!</u>



Nobody knows better than you that in today's market the extra values built into a house make the difference between Sale and No Sale.

Most "extras" add to your cost—but Durall Aluminum Tension Screens reduce it!

Durall consumer prices range from \$3.65 to \$5.82 for most sizes. Compare that with your present screening costs!

Not only will these new and different screens cost you less—your home owner will be everlastingly grateful to you because he'll have no upkeep. Duralls



last much longer than conventional screening-never warp, rot, rust or stain.

Duralls are pre-made to fit! That means your installation costs are sharply cut. It also means the home owner can put them on or take them off from the inside in just nine seconds. He can roll them up to store in a nearby closet instead of lugging them from window to basement or attic.

Ask your lumber or hardware dealer today for money-saving, time-saving, sales-building Durall Tension Screens.



N. Y. Wire Cloth Co., Inc., New Canaan, Connecticut



This is the beautiful new Capri featured in our Golden Opportunity Program. Ask for details.

I_F, as the statisticians tell us, the woman is 84% of the decision factor in choosing body style, color and upholstery in automobiles, how much of a decision factor is she in choosing the family home?

Actually, the average woman has made it her business to know a great deal about homes and practically every home you build has to pass a jury of several or many women whose wants are quite well defined.

They want comfort and convenience, of course, and quality and value as a matter of common sense. And, most definitely, they want style—style that they'll be happy to live with and proud to show off; style to bring compliments from arriving guests and charm them from room to room; style that doesn't neglect the rear elevation or the inconspicuous gable; style that wears well because it is sound, and satisfies because it is beautiful.

When a woman finds a home like this, she's quick to say "Yes" because it's what she wants. And that's exactly why we include all of them in Modern Homes—comfort and convenience, quality and value and, genuine custom styling of outstanding distinction.

Maybe you should investigate the opportunity of building fine Modern Homes in your community. Why not give us a call at LUzon 4-1550.



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Manufacturing plants at Dearborn, Michigan and Port Jervis, New York

Sold 12 G-E"Young America"



This is the kitchen of the Caplan General Electric "Young America" Home that helped sell so many houses. It contains:

G-E Refrigerator, G-E Food Freezer, G-E Range, G-E Dishwasher, G-E Disposall, © G-E Automatic Washer and Dryer.

REGARDLESS OF PRICE RANGE, your houses can have a G-E Kitchen-Laundry

(See your G-E distributor for suggestions on merchandising your homes)



IN YOUR \$9,995 HOUSES

Includes G-E Refrigerator, G-E Range, G-E Automatic Washer, G-E Disposall and G-E Cabinets. Adds as little as \$2.98 monthly to mortgage payments.



IN YOUR \$12,500 HOUSES

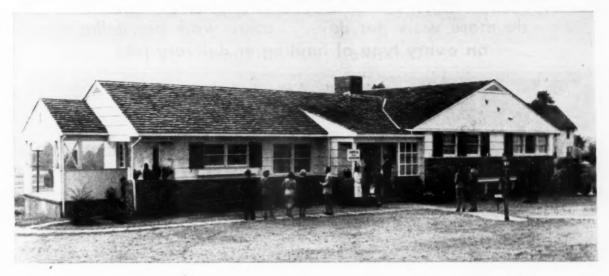
Includes G-E Refrigerator, G-E Range, G-E Dishwasher, G-E Disposall, G-E Automatic Washer, G-E Cabinets. Adds as little as \$5.31 monthly to mortgage payments.



IN YOUR \$16,000 HOUSES

Includes G-E Refrigerator, G-E Range, G-E Dishwasher, G-E Disposall, G-E Automatic Washer, G-E Dryer, G-E Cabinets. Adds as little as \$6.31 monthly to payments.

Houses the first month!



THE ?

Alexander Caplan's model home in Chatham Township, New Jersey was a G-E "Young America" House—erected by the builder from basic plans supplied by the Home Bureau of General Electric. The G-E Kitchen-Laundry particularly delighted prospects.

IT WILL PAY you to investigate how helpful General Electric's Home Bureau can be in this new era of tougher selling—just as it has been to Mr. Caplan and other successful builders throughout the country. Today people are getting mighty choosy and want more for their money.

Just completed are specifications for 4 new "Young America" Model Homes which contain features prospects want most in their new homes . . . features they can afford.

Outstanding among the "want-most" features is the attractive General Electric Kitchen-Laundry.

The value of these dependable appliances can usually

be included right in the regular mortgage, and the monthly cost to the home owner is usually no more than that for a typical telephone bill.

Builders in scores of cities are reporting phenomenal sales results of General Electric "Young America" Houses. Why don't you get all the facts through your General Electric distributor today?

Home Bureau, General Electric Company, Appliance Park, Louisville, Kentucky.

New G-E Room Air Conditioners at low per-unit cost! Models are easily installed. No plumbing required.



You can put your confidence in-

GENERAL ELECTRIC

NEW CHEVROLET TRUCKS

do more work per day . . . more work per dollar on every type of hauling or delivery job!



Time and money are the two most important factors in any trucking job—and the new Chevrolet trucks for '54 are built to save more of both!

THEY SAVE YOU TIME

Whether you deliver door-to-door or haul state-tostate, new Chevrolet trucks will speed up your schedules. They bring you new hour-saving engine power —greatly increased acceleration and hill-climbing ability. You save time with greater safety . . . and without increasing your maximum road speeds. In traffic or on delivery routes, new truck Hydra-Matic transmission* saves time, and saves driving effort as well. It's the last word in no-shift truck driving.

THEY SAVE YOU MONEY IN EVERY WAY

Along with increased power, these great new trucks bring you increased operating economy. You enjoy hefty gasoline savings in every model, thanks to new high-compression performance. In addition, you save on upkeep and maintenance. That's because you get extra strength and stamina in drive line and chassis. There are heavier axle shafts in 2-ton models, newly designed clutches and stronger frames in all models.

See your Chevrolet dealer for all the facts about the "savingest" Chevrolet Advance-Design trucks ever built! . . . Chevrolet Division of General Motors, Detroit 2, Michigan.

MOST TRUSTWORTHY TRUCKS ON ANY JOB!



CHEVROLET ADVANCE-DESIGN TRUCK FEATURES THREE GREAT ENGINES—The new "Jobmaster 261" engine* for extra heavy hauling. The "Thrift-master 235" or "Loadmaster 235" for light-, medium- and heavy-duty hauling. NEW TRUCK HYDRA-MATIC TRANSMISSION*—offered on ½-, ¾- and 1-ton models. Heavy-Duty SYNCHRO-MESH TRANSMISSION—for fast, smooth shifting. DIAPHRAGM SPRING CLUTCH—improved-action engagement. HYPOID REAR AXLE—for longer life on all models. TORQUE-ACTION BRAKES—on all wheels on light- and medium-duty models. TWIN-ACTION REAR WHEEL BRAKES—on heavy-duty models.

DUAL-SHOE PARKING BRAKE—greater holding ability on heavy-duty models. NEW RIDE CONTROL SEAT*—eliminates back-rubbing. NEW, LARGER UNIT-DESIGNED PICKUP AND PLATFORM STAKE BODIES—give increased load space. COMFORTMASTER CAB—offers greater comfort, convenience and safety. PANORAMIC WINDSHIELD—for increased driver vision. WIDE-BASE WHEELS—for increased tire mileage. BALL-GEAR STEERING—easier, safer handling. ADVANCE-DESIGN STYLING—rugged, handsome appearance.

Optional at extra cost. Ride Control Seat is available on all cab models, "Johnaster 261" engine on 2-ton models, truck Hydra-Matic transmission on 1/2-, 1/4- and 1-ton models. LATEST BUILDING Edition

FLORON FLASH

WEATHER: Favorable for Installing Floors

Vol. 4

San Francisco, California

BUILDERS PRAISE NEW PLASTIC TILE!

Pabco Floron Offers Beauty, Resiliency Even Over Concrete

A perfect answer to the problem of creating comfortable, colorful, easy-to-clean floors that are economical and long-lasting has been developed by Pabco Products Inc. It's sensational new Pabco Floron Tile, acclaimed enthusiastically by architects, builders, commercial and institutional buyers.

Easily installed on any floor, including grade-level concrete slabs, this new plastic tile solves the "Big 9" complaints about commercial floor tiles. Floron eliminates objections about "priced too high; can't install on grade; not resistant to rot; too hard on feet; indents too easily; unmatched joints; unattractive colors; installation cost too high; or difficult maintenance."

Tough and long-wearing, yet resilient, Floron gives excellent resistance to alkali, acid and grease. It withstands dampness and rot; the surface resists indentation. Its attractive brushed design is available in seven rich colors to blend well into any color scheme.

The result of five years of intensive research by Pabco's laboratories, this great new plastic tile outscores all other floor tiles in actual on-the-job installations, as well as rugged laboratory tests.



For complete details write:
PABCO PRODUCTS INC.

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PABCO – Home of "California Originals" Linoleum, "Pebbletone" Linoleum, "Onyxtone" Linoleum, "Calitone" Linoleum Tile, Pabco Rubber Tile (Western states only), Mastipave & enamel surface floor coverings.



PABCO FLORON—THE ALL-PURPOSE FLOOR—The phenomenal success of Pabco's new plastic tile across the country is attributed to its versatility. Beautiful in design and color, tough in wearing qualities, so simple to maintain, and, best of all, so suprisingly low in price—Pabco Floron Tile has proved the ideal floor covering for offices, stores, schools, hospitals, restaurants, hotels, motels and homes. Seven colors are available—gray, light green, dark green, cocoa and yellow, coral gray, woodtone, and red.

"Big 9" Complaints on Floor Tiles Answered by Floron

- NO COMPLAINTS ABOUT PRICE—A plastic tile that costs only pennies more than standard-gauge linoleum.
- NO COMPLAINTS ABOUT CONCRETE INSTALLATIONS—Designed for direct application over concrete. Ideal for wood floors, of course.
- NO COMPLAINTS ABOUT ROT Exclusive rubberlike water-resistant backing unaffected by dampness or rot . . . even over grade-level slab concrete.
- NO COMPLAINTS ABOUT TIRED FEET—Backing has surprising "spring." Gives Floron amazing resiliency for comfort underfoot.
- NO COMPLAINTS ABOUT INDENTATION—Resilient yet mirror-smooth surface resists indentation.
- NO COMPLAINTS ABOUT UNMATCHED TILE JOINTS—Tiles don't expand or contract. Can be laid simply and quickly with T-square precision. Seams are virtually invisible.
- NO COMPLAINTS ABOUT MAINTENANCE—Extreme alkali, acid and grease resistance minimizes cleaning. Smooth non-porous surface defies "enemies" of many floorings.
- 8. NO COMPLAINTS ABOUT LACK OF BEAUTY—Smart decorator colors featured in Pabco's beautiful brushed directional design.
- NO COMPLAINTS ABOUT INSTALLATION COSTS—Floron lays quickly easily. Precision-fitted tile that is so simple to trim cuts down installation time and wasted tiles.

Ripplewood.





DEN-DINING ROOM



KITCHEN



FAMILY ROOM

25,000 See G-P Ripplewood In Four Distinctive Rooms

In the den-dining room, family room, kitchen and utility room they saw and loved G-P Ripplewood wall paneling. Thousands-said, "That's what we want," and asked, "Where can we get it?" During the two-week showing, more than 25,000 people visited this model home built by Byrd Real Estate to promote its new Vestavia Hills subdivision.

GEORGIA - PACIFIC

PLYWOOD COMPANY

Dept. AB-3, 270 Park Avenue, New York 17, N. Y.

the exciting textured paneling that makes them buy





CHARLES BYRD of Byrd Real Estate Co., Inc. says: "G-P Ripplewood was the sensation of our Better Homes and Gardens 'Readers' Choice' model home. There was tremendous enthusiasm for this wall paneling. It was far and away the most popular feature in our home. We sold the model and made a number of other sales, too, and feel that a large share of the credit for the outstanding success of our promotion belongs to G-P Ripplewood."

G-P RIPPLEWOOD MAKES HOMES SELL FASTER

Discover for yourself the powerful sales appeal of Georgia-Pacific's Ripplewood. You'll find it the most popular feature in your homes, too . . . with the kind of popularity that brings out the checkbooks and makes your homes sell faster.

It all stems from G-P Ripplewood's exclusive combination of features and advantages: the rich sculptured texture, the swirling grain pattern, the beautiful and distinctive finishing effects that are so easy to obtain, and the genuine wood construction. They all add up to the luxury look that catches the eye and the "I'll buy" of today's home shoppers.

You'll be amazed how little it costs to panel and finish a room with G-P Ripplewood . . . little more than many ordinary wall materials. G-P Ripplewood comes in standard 4' x 8' panels and full-size 12" and 16" squares. See your Georgia-Pacific dealer or mail coupon for further information.





FREE: Builders' Fact File. Send for handy kit of G-P Ripplewood literature specifications, sales features and other useful data.



Georgia-Pacific Plywood Company
Dept. AB-3.270 Park Awe., New York 17, N. Y.

Please send me the G-P Ripplewood Builders' Fact File

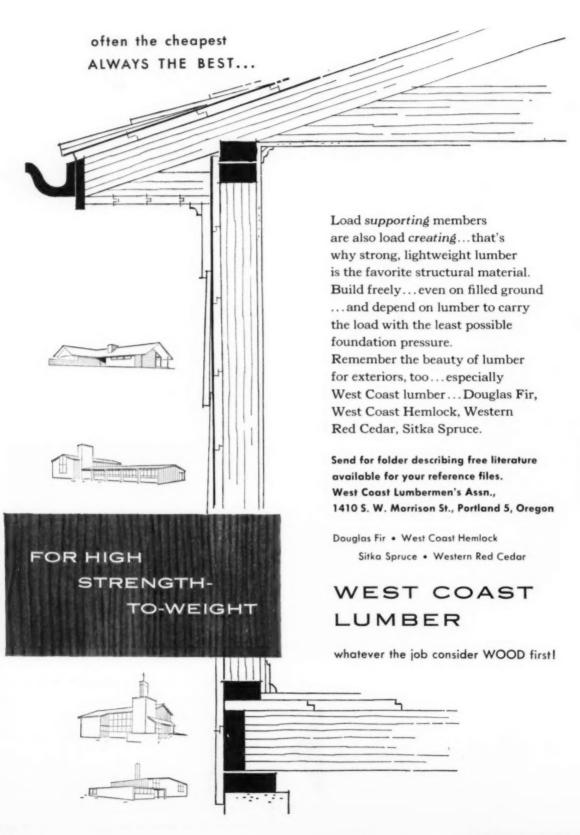
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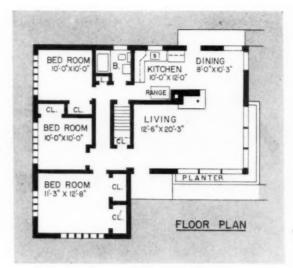
CITY

STATE





draw crowds to your model; plan on opening at home show time





Dress up your model home with a new construction feature and time its opening to coincide with that of the local home show. Prepare a booth at the show so attractive that it will be a strong incentive for visitors to drive across town and see your house. Support the booth-home show house tie-in with a strong promotion campaign in local newspaper.

Operating on that formula at

"SCR brick" is used extensively in this pilot house for new Potts town, Pennsylvania project. Built on sharp slope, house appears two stories high when viewed from rear



Window areas make up most of side wall facing street





View across living room takes in end of fireplace wall (left) and half of a 24-foot window area. Full-thick flush doors are used for each bedroom closet

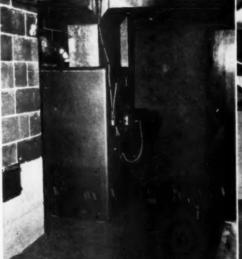
Pottstown, Pennsylvania, Allen K. Davidheiser induced 5,000 persons to inspect his model the first two days it was opened. No attempt to secure sales was made at the time, for the show monopolized the builder's time; however, more than 20 of these visitors left their names at the house so that he could get in touch with them later.

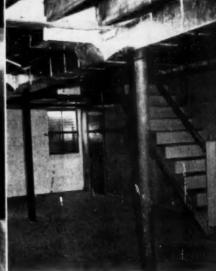
The model was a three-bedroom, one-story and basement house.

Priced at \$16,500 with a 65x125foot plot, it featured profuse use of
the new "SCR brick." In addition
to the exterior walls, this was the
basic material used in a 28-foot,
L-shaped planting box built under
the corner window group in the living room. Inside, it made up a 12foot-long wall with a two-way fireplace at the open end—the only
partition separating living room,
dining room and kitchen.



Kitchen cabinet corner has recessed fluorescent light over sink top, with steel casement window in back





High headroom basement is partitioned into three rooms. One of the smaller rooms contains forced warm-air furnace and laundry tubs; another is used for storage. Doors and trim are of same quality used upstairs. Rear elevation is above grade, has full-size windows and door

ARKANSAS SOFT PINE

SSORIO Stab

A TRADE MARK THE Gives

Here's Why:

Communication of the Communica

Soft texture is inherent in
Arkansas Soft Pine timber.
As lumber it is dried in advanced type, cross circulation
kilns, automatically controlled. By this
precision process, it is stabilized at the
moisture content required by the Southern
Pine Inspection Bureau, under whose rules it
is graded and grade-marked.

Thus stabilized, Arkansas Soft Pine retains its natural "life" free from case-hardening. Result—nails are driven home without splitting the wood, to be tightly gripped and securely held permanently . . . your dependable assurance of sound framework.

Arkansas Soft Pine is sold by lumber dealers east of the Rockies. For data, illustrated grades, specifications, send today for this FREE Handbook.

Manufactured Exclusively by BRADLEY LUMBER CO. OF ARK., WARREN, ARK.

CROSSETT LUMBER COMPANY, CROSSETT, ARK.

DIERKS LUMBER & COAL CO., KANSAS CITY, MO.

FORDYCE LUMBER COMPANY, FORDYCE, ARK.

FROST LUMBER INDUSTRIES, SHREVEPORT, LA.

Forest Products Division of Olin Industries, Inc.

OZAN LUMBER COMPANY, PRESCOTT, ARK.

SOUTHERN LUMBER COMPANY, WARREN, ARK.

Composing The

No.2-110

SIGNIFIES ilized Soft Texture

Tops in Rigid Framework Because It Provides
 Supreme Nail Holding Power



333 BOYLE BUILDING . LITTLE ROCK, ARKANSAS



Genuine red cedar shingles add a distinctive architectural "flavor" to most any home style. Cape Cod, Colonial, Western Ranch—all look their best when topped with cedar. *Sell* their best, too!

Buyers recognize CERTIGRADE No. 1 shingles to be quality through and through. They know there's an important difference between the real thing and a substitute. They want that difference—that "plus value"—in the homes they buy.

That's where you come in. Selling homes with cedar shingle roofs is a pleasure. You needn't apologize for a thing. You're selling quality. You're selling the roof that has stood the test of time. The roof that does more *for* a home by adding beauty, strength and insulation. The roof that does more *to* a home by providing "bonus years" of trouble-free service.

What's more, you can market genuine cedar shingle roofs for the same price as makeshift materials. The secret's in the sheathing. Cedar shingles—one of the strongest materials known for their weight—may be applied over spaced sheathing. That means you save up to 50% on sheathing costs when building with cedar. Those savings in application time and materials pay the difference between genuine cedar shingles and substitutes.

So start selling homes as you'd sell hotcakes—with the *right* topping. Cedar will help you gain the reputation of a *quality* builder and a *volume* seller.

For your free copy of a handy roof estimating sheet, write:

the most costly, it does require a distinctive "flavor."

RED CEDAR SHINGLE BUREAU

5510 WHITE BUILDING, SEATTLE 1, WASHINGTON

OR 425 HOWE STREET, VANCOUVER 1, B. C.





Handle all these Jobs with the VERSATILE



LOADS OR TRANSPORTS sand, gravel, cement, other bulk materials with ½ yd. rear-mounted hydraulic bucket, Dumping height of 8 ft., 8½ in, allows easy loading of high truck bodies.

Model D Grader



BACKFILLS ditches, trenches: packs and levels ground; loads excess dirt to trucks. Tandem drive and 8.800 lb. weight provide plenty of traction when working in soft materials.

With original cost but one-third that of a large grader, low operating cost and almost unlimited versatility, the Allis-Chalmers Model D Motor Grader is helping builders cut costs on a variety of jobs.



LANDSCAPES, grades lawns, levels around houses. Maneuverability lets Model D work easily in narrow quarters.



BUILDS AND MAINTAINS roads, streets, alleys, driveways; spreads rock; scarifies; cleans up on construction work. Excavates shallow for slab foundations.



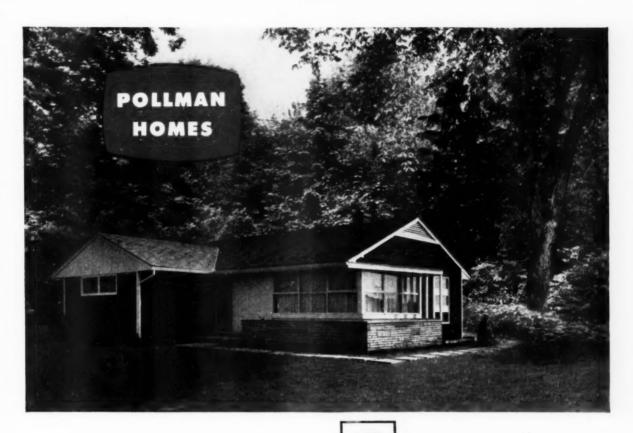
ROUGH GRADES for curbs, gutters; finish grades shoulders, sidewalks, between forms; cuts and cleans drainage ditches; removes weeds and brush.

LOADS SNOW with bucket or cleans it with blade or V-type plow to help keep winter building operations on schedule provides year-round versatility.

LET YOUR DEALER DEMONSTRATE right on your own job what the versatile

50-hp. Model D can do for you — on a low equipment investment. Or send for complete information.

ALLIS-CHALMERS



Consider the Shape from a Profit Angle

Here is a 3-bedroom house with a remarkable floor plan that can save you money. Like other Pollman Homes it is designed for convenient living and styled to appeal to the most discriminating buyer. It offers you the economies of Pollman top flight designing and engineering, and controlled factory assembly. In addition its various orientation possibilities and choice of elevations permit a builder to further cut costs by concentrating on a single house. With the L-SHAPE you avoid completely that "peas in a pod" look.

If you are a builder or an investor interested in building better, more salable homes for less money, write today. We will be glad to send you complete information or have our local factory representative call. FOUR ORIENTATIONS
FROM ONE BASIC FLOOR PLAN

The Pollman L-SHAPE homes can be oriented 4 different ways and are available in many different elevations. Both basement and non-basement models. Exterior treatment includes lap-siding, shake shingles, vertical siding in both painted and stained surfaces.





THE THYER MANUFACTURING CORP.

2854 Wayne Street Toledo, Ohio

For information on the Southerner Line of L-SHAPE Pollman Homes for Southern and Gulf Coast climates

Write THE THYER MANUFACTURING CORP. . 4181/2 EAST PEARL STREET DEPT. 5, . JACKSON, MISS.



How to pick a door

So many jobs for so many doors — which door is the right one? Here's a way to pick:

Decide on your source of all flush doors first. Pick Atlas Plywood. Then you know you have the range of sizes, kinds, woods and qualities to fit any opening. Atlas Plywood furnishes you hollow or solid core flush panel doors

for every purpose. You're sure of getting what you order because Atlas Plywood controls manufacture, inspection and service in every step from forest to finished product. It is among the oldest and largest suppliers of plywood and its products. Make "Atlas Plywood" your word for doors. It's your best and easiest way.

Atlas Plywood

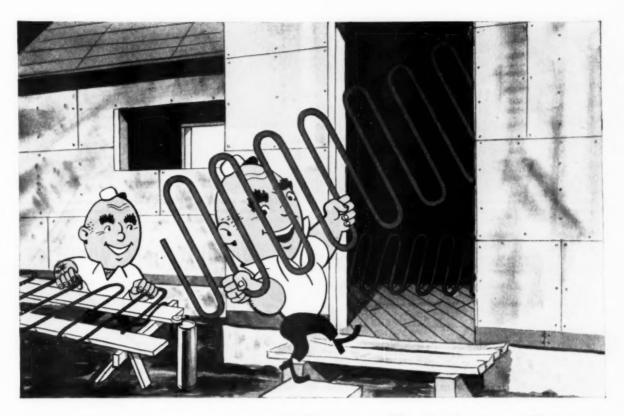
CORPORATION

FROM FOREST TO FINISHED PRODUCT

Boston 16, Mass. Distributors in all principal cities

ALL THE WOODS ALL THE GRADES ALL THE SERVICE

Whatever you specify in "Atlas Plywood or equivalent" in doors, dealers can get exactly and speedily from Atlas Plywood Jobbers. You get all the advantages of flush doors for modernity, beauty and ease of cleaning and maintenance PLUS the advantage of Atlas Plywood's quality control from forest to finished product.



Here's ease of installation <u>plus</u> economy in ceiling radiant heating

You save material costs and fabrication time with Bundyweld Tubing, performance-proved in thousands of ceiling radiant heating systems throughout the country.

Consider these advantages: Bundyweld is extra-strong, yet ductile; bends easily to short radii on a simple fixture in the shop or at the job site. It comes in standard, 20' lengths with one end expanded, when specified, for simpler, sounder joining.

Bundyweld is tough enough to withstand the usual rough handling, too. Although lightweight, it's rigid enough so that two men can easily position a group of joined coils. The smooth coils keep their shape; lie flat against the ceiling for easy plastering, with no waste of time or material.

In your completed system, Bundyweld transmits heat efficiently; conducts water with a minimum of friction. Just check below for the advantages that only Bundyweld can give you. Then, write us today for more information.

Radiant Heating Division
Bundy Tubing Company • Detroit 14, Michigan

Bundyweld Tubing

DOUBLE-WALLED FROM A SINGLE STRIP

WHY BUNDYWELD IS BETTER TURING



Bundyweld starts as a single strip of steel which is coppercoated Then it's



continuously rolled twice around laterally into a tube of uniform thickness, and



passed through a furnace. Bonding meta fuses with basic



double - walled and brazed through 360°



NOTE the exclusive Bundydeveloped beveled edges, which afford a smoother joint, obsence of bead, and less chance for any leakage.



FLOOR TO CEILING INSTALLATION OF BOLTA-WALL provides beauty and protection in busy corridors and rooms at Seton Hospital. Note that Bolta-Wall is applied first; floor and rubber cove base are installed later.



CHART ROOM SHOWS BOLTA-WALL ADAPTABILITY on counter fronts matching walls. Seton Hospital found Bolta-Wall ideal for use in the institution — from Pediatric Unit to private rooms and cafeterias.

TEXAS HOSPITAL ADDS WING AND REMODELS WITH

Bolta-Wall BY THE TILE AND BY THE YARD

Beautiful, tough, easy-to-apply vinyl wall covering fills need for lasting installation at Seton Hospital

Here's what one hospital did with Bolta-Wall. It's a profitable example of what you can do for your customers in homes, offices and institutions of all kinds.

Seton Hospital, Austin, Texas used 30,900 sq. ft. of Bolta-Wall for their recent renovation. They used it in corridors and rooms . . . in cafeterias, on counter-fronts and in private dining areas.

They used it because Bolta-Wall is a product of incomparable beauty and durability at the price . . . because maintenance costs are unbelievably low — replacement and repair are virtually eliminated and cleaning is easy with a damp cloth . . . because Bolta-Wall is fire-retardant, conforming to Paragraph

E-3b of Federal Specifications SS-A-118a (New York Testing Laboratories, Inc.).

Bolta-Wall is highly resistant to scuffing, staining and fading, will not crack or peel and withstands impact. It adheres to old or new walls with little if any prior refinishing of wall surface. Dimensional stability insures no seam shrinkage. It is heavily advertised to the people you serve.

Bolta-Wall is available in 3 outstanding patterns, Bamboo, Leathergrain and the new Mahogany woodgrain. All come in a wide range of handsome decorator colors. Send for free samples and specifications, Box 508...

BOLTA, Lawrence, Mass.



Bolta-Wall Leathergrain

Bolta-Wall Bamboo (in rolls and 8" x 8" tiles)



New Bolta-Wall Mahogany (in rolls and 8" x 8" tiles)



PRIVATE DINING AREA IN SETON HOSPITAL with walls covered in textured Bamboo Bolta-Wall. This semi-flexible vinyl material can be curved or bent sharply for easy tailoring around corners.

TRIMMING IS EASY WITH BOLTA-WALL. Material can be cut with ordinary knife or scissors. Combine Bolta-Wall tiles with Bolta-Wall by the yard as wainscoting for handsome effects.



TEMCO, inc.

NASHVILLE, TENNESSEE

BUILDER OF OVER

11/2 MILLION GAS APPLIANCES

TEMCO, Inc.

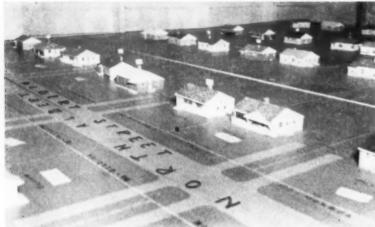
Department B-650, Nashville, Tennessee

Please send catalogs and full information about Temco Automatic Gas Wall Heaters and Temco Automatic Gas Floor Furnaces.

Name

Address





Models placed on plywood duplicate, in miniature, the development being built at the actual site; streets and lot lines give prospects an accurate preview of the neighborhood

here's a way to

Donnay-reitz inc. of St. Paul, Minnesota, have little trouble selling their houses in the firm's Roseville Terrace subdivision, north of the city. They use miniature models to help merchandise their homes.

Here is what they do: They plot an entire neighborhood in miniature where prospects can see at a glance how the area and each house will appear when the project is completed.

Each miniature is a duplicate in color of an actual building, either completed or under construction at Roseville. Roseville Terrace now consists of about 134 houses, including the latest group of 54 now being built or recently completed.

The miniatures are placed on sheets of plywood. The sheets are painted green to simulate grass and are marked in sections Each section represents, in scale, a lot plotted in the Roseville development. Streets are indicated in gray on the plywood. On each section that duplicates an actual lot is placed a miniature model of the house to be built. Each of the models duplicates one of ten basic front elevations.

Donnay-Reitz use one basic floor plan, but have designed ten different elevations to add variety to the appearance of their development. When the basic floor plan is reversed, still greater variety is achieved. To further enhance a feeling of difference in the homes, some of them are set back from the street while others are placed forward on their respective lots. Still others are situated diagonally. Each home is given different color treatment.

Each miniature model, therefore, being a true representative of its actual counterpart, indicates to the prospect how his future home will look as to its placement and appearance.

Donnay and Reitz begin their developments by putting up a "sample" or "pilot" house. It is built exactly as the others in the development will be except, of course, for the front elevations which vary according to the ten basic elevation designs.

The partners make the sample demonstration house a salesroom. When prospects enter the sample house they are free to inspect the quality construction. In the living



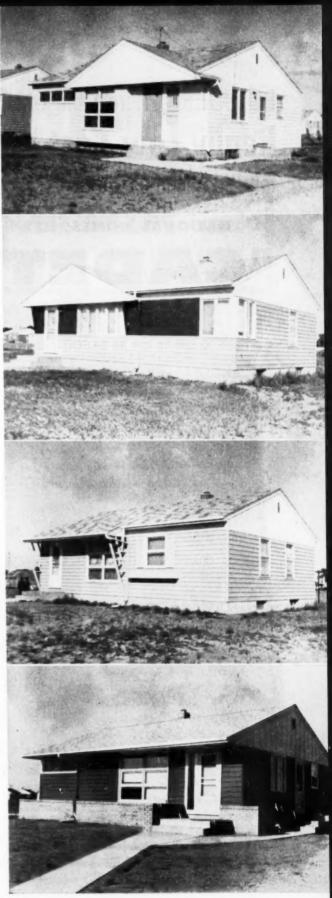
One basic plan is used, is often reversed; ten different elevations are available to buyers; four elevations are shown (right) as they will appear when built

sell houses

room placards tell the potential buyer about prices and financing. (Prices range from \$12,250 to \$12,742.) Other placards illustrate the ten different elevations available.

The miniature model neighborhood is set up in the basement. Prospects can decide which elevation and which lot they prefer, but they must accept the exterior color pattern of the house shown. If the color pattern is not palatable, the prospect must choose a house in another location. Each lot and house bears a number which corresponds to an identical number placed at the site of each house. If the prospect is sufficiently interested, he is taken to the site of the house he has chosen. If he buys, the miniature model of his house is given to him.

George Donnay's and Martin Reitz's merchandising plan is a success. Most people who come to look, linger and usually buy. Quality construction, moderate prices and miniature models do the trick. "Sold" signs often go up on the miniature neighborhood before the houses it demonstrates are completed.



BUILDERS! Here's the Only

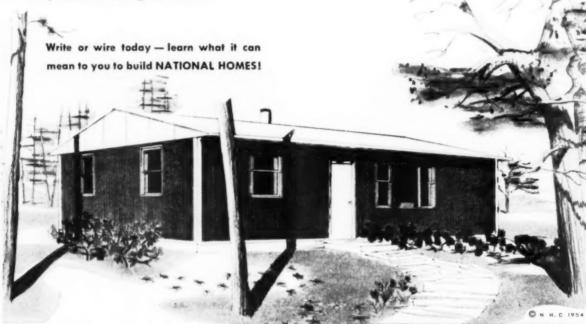
Really Low-Cost House

for Big Volume... Assured Profits!

NATIONAL HOMES' NEW

"CADET"

- Priced to sell as low as \$4800 plus lot!
- Less than 80 hours On-Site Erection Time!
- Complete Financing Available!



ALSO PRODUCERS OF THE THRIFTY "PACEMAKER"...THE

DE LUXE "CUSTOM-LINER"...THE OPEN LIVING "RANGER"...

EACH THE STYLE AND VALUE LEADER IN ITS PRICE CLASS

ALL CADETS have smart beamed ceilings and many other sales-making features



Mr. BUILDER!

QUICKER SALES and BIGGER PROFITS

When you install Kaustine oil-fired, fully automatic heating in your homes, you make your selling job easier. You offer today's exacting buyers a top quality heating plant with an unsurpassed ability to deliver maximum heat per fuel dollar and an enviable record for trouble-free service.

Kaustine Engineering and Factory
Assembly enable you to cut construction and installation costs.
Kaustine Design saves valuable floor space
as these compact units operate efficiently in
a minimum area. Add to this Kaustine's
competitive cost and you have a greater
profit margin.

The Kaustine line offers forced air heating units delivering from 65,000 to 250,000 B. T. U.'s in models for every type of installation in any style or size of home.



The Kaustine "LOW BOY"

These fully automatic oil-fired Low Boys are designed for cellar installation. There are three factory assembled models delivering 85,000 B.T.U.'s, 95,000 B.T.U.'s and 110,000 B.T.U.'s. Larger units up to 250,000 B.T.U.'s are shipped knocked down.



WRITE FOR FULL INFORMATION TO DEPT. AB-3

There is a Kaustine Furnace or Winter
Air Conditioner for every type of home.

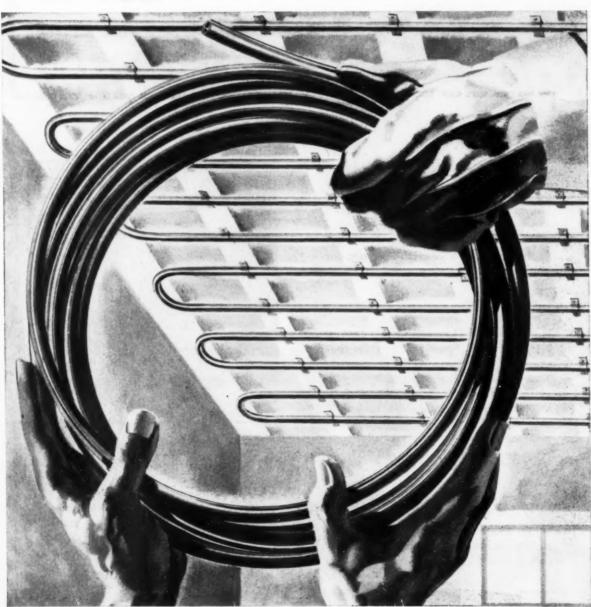
FOR RADIANT HEATING

choose handy, lightweight

CHASE COPPER TUBE



Small outside diameters make Chase lightweight Copper Tube "builder's choice" for ceiling, floor and wall installations. Easy-bending long lengths mean fewer fittings ...joints that are a cinch to make with leak-proof Chase Solder-Joint Fittings. And, of course, Chase Copper Tube gives you long service, excellent thermal conductivity, and corrosion resistance. Write today for FREE 50-page Book on Radiant Panel Heating.



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CHICAGO 5, ILL



SLIDING DOORS ADD
BEAUTY...SPACE...
Sterling HARDWARE ADDS
"QUALITY BY DESIGN"



Simple to install . . . better when installed. No expensive callbacks due to failure of operation because Sterling Sliding Door Hardware is better designed. It has been tested and proved through years of continued service in homes everywhere.

Sterling Sliding Door Hardware is available in Complete Packaged Sets to fit most door openings. Write Today For Catalog.

STERLING HARDWARE MFG. CO.

Sterling means Quality



NATIONALLY ADVERTISED in Leading Magazines SEE OUR CATALOG IN SWEET'S: Architectural File • Light Construction File VISIT OUR DISPLAYS: Architects Samples Corporation, N.Y.C. Chicagoland Home Building Center

take a good look at LARCH



one of 10 woods from the

WESTERN PINE region

Strong, durable and straight-grained, Larch is an ideal wood for all structural and heavy construction purposes. Tough-fibered and rigid, it holds its shape, works well and resists nail withdrawal. Larch's handsome grain, satin-smooth surface and reddish color put it in demand for interior architectural woodwork, too.

Larch comes in 3 select, 5 common, 3 structural, 4 dimension grades. You can order it in straight or mixed car lots, together with other woods of the Western Pine region.

the Western Pines

IDAHO WHITE PINE PONDEROSA PINE SUGAR PINE

the Associated Woods

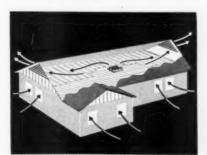
LARCH
DOUGLAS FIR
WHITE FIR
ENGELMANN SPRUCE
INCENSE CEDAR
RED CEDAR
LODGEPOLE PINE



get the facts on LARCH
write for the FREE illustrated booklet to
WESTERN PINE ASSOCIATION
Yeon Bidg., Portland 4, Oregon



Hunter Attic Fan cools the entire house at lowest cost



Home buyers who want cool comfort at lowest cost are "sold on" the Hunter Attic Fan. Initial cost is low, operating expense is only a few cents a night, and there is no maintenance.

The Hunter Attic Fan's method of cooling a house is simple (see drawing at left). It drives out hot, stagnant air through the attic and creates a strong suction which pulls in fresh, cool air from outdoors.

This compact cooling unit, com-

plete with automatic ceiling shutter, is easily installed in any home. It requires only 18" attic clearance, so is ideal for low-pitched roofs. Certified air deliveries range from 5000 to 16000 cfm-for any home size and any climate.

You can depend on the same smooth, quiet operation that has made Hunter Fans famous for 67 years. Fan unit is guaranteed for 5 years, ceiling shutter and motor for 1 year.



For complete specifications, write

HUNTER FAN AND VENTILATING COMPANY 381 S. Front St., Memphis 2, Tenn.

TER Attic

SEE OUR CATALOG IN SWEET'S



Electronic Moduflow bome in Seattle, Washington. Builder: Albert Balch. Architects: Grainger, Thomas and Barr. Electronic Moduflow was installed by Rossoe.

Thermostat outside the house gives wonderful Weather Control inside

Honeywell Electronic Moduflow comfort helps make this Balch-built house distinctively modern

It's electronic magic! It's an exciting new comfort control system that uses an outdoor thermostat to automatically regulate indoor comfort. Albert Balch, well-known Seattle builder whose house you see here, installs Electronic Moduflow in all the homes he builds. Install this fascinating feature in your new homes and watch the immediate favorable impression on your prospects.

Honeywell is using an extensive national adver-

tising program—13 spreads in LIFE Magazine—to help create demand for your new homes... and to make Honeywell Electronic Moduflow become a top sales tool for you. Many of your prospects will see these ads and will want to know more about Moduflow and Moduflow-equipped houses.

Add modern Electronic Moduflow to your homes . . . you'll add a LIFE-advertised, extremely salable feature to enhance your fine houses.



How Electronic Moduflow Works

The Electronic Weathercaster (1), mounted outside the house, senses the outdoor temperature and by means of electronic signals continually tells the Electronic Clock Thermostat (2) what indoor temperature is required to maintain comfort. This Electronic Clock Thermostat, mounted in the living room, signals the Relay Amplifier (3) which automatically adjusts the heating plant to provide the proper amount of heat required to keep the home at just the right temperature - no matter how changeable the winter weather might be.

A leading Northwest Builder



Albert Balch is one of the country's leading builders. He has built hundreds of homes of every type in the Seattle area. Balch-built homes range in price from \$7,900 to \$30,000. Mr. Balch is using Honeywell Electronic Moduflow in every house he builds.

For complete information on Electronic Moduflow for the homes you build, contact your heating contractor, your local Honeywell office, or mail the coupon shown at right below.



Electronic Moduflow

104 OFFICES ACROSS THE NATION

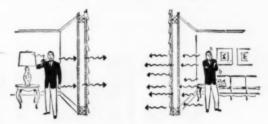




"Cold wall" problem solved by Moduflow

With a chilly outside temperature (top sketch), occupants feel comfortable when indoor temperature is 71°. But as it drops (lower sketch), heat loss increases, so higher indoor temperature is needed to compensate for colder walls. Electronic Moduflow does this automatically by raising control point of indoor thermostat so more heat is supplied.

MODUFLOW PROVIDES MORE COMFORT BY VARYING INDOOR TEMPERATURES



Why people need varying temperatures

Tests show if indoor temperature is merely held constant when outdoor temperature falls, a person inside feels uncomfortable. As the walls of the room become colder, they "draw" increasing amounts of heat from the body.

MINNEAPOLIS-HONEY	WEIL	RECULATOR	CO
MINNEAPOLIS-BONE I	WELL	WEGGEVION	CU.

Dept. AB-3-42, Minneapolis 8, Minnesota

Gentlemen: Please send me information on Electronic Moduflow.

Firm Name

Address Zone State ___

MARCH 1954

149



"SCR brick" home, Des Moines, Iowa. Robert B. Metier, builder-designer

brick homes priced like frame

You can give home buyers brick's extra value and beauty— at no extra cost—when you use

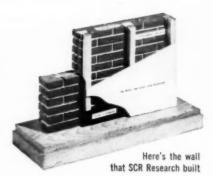
SCR brick

PATENT PENDING

thru-the-wall construction

VALUABLE SALES AID...Your "SCR brick" dealer can show you how to use this scale model of "SCR brick" construction as a helpful selling tool. (right)

USEFUL CONSTRUCTION DETAILS... Free booklet "How to Build Homes that Sell with the 'SCR brick'" gives full construction details. To get one, just write us on your letterhead. Address: Dept. AB-3



STRUCTURAL CLAY PRODUCTS INSTITUTE

1520 18th Street, N. W., Washington 6, D. C.



AMERICAN BUILDER



MEANS:

no sagging...no warping lifetime satisfaction!

There's nothing vague about the superior quality that's built into every Curtis New Londoner Hollow Core Flush Door. For instance, the core and grid are manufactured to such precision standards that permitted tolerances have a plus or minus margin of only $\frac{1.5}{1000}$ of an inch!

That's typical of the skill and care that make these better doors famous for their dimensional stability. The patented hollow core of the New Londoner is locked into the stiles, rails and lock blocks. Every New Londoner Door is a completely joined unit with nothing to get out of place.

Time works for you-not against you-when you choose Curtis New Londoner Doors-because these doors give LASTING satisfaction to the homeowner. That's been proved by more than 4,000,000 installations. When the doors have to be good, specify "Curtis New Londoner"-and be sure.





For complete information see 'Curtis New Londoner' section in Sweet's Architectural Catalog or mail the coupon.

Door designs shown here-and many others-are available either with Curtis New Londoner hollow core construction or Curtis American solid core. These are only a few of the many Curtis offers, both for exterior and interior use. These doors are available in wide widths for schools, hospitals and public buildings.

FLUSH DOORS

Curtis Companies Service Bureau 200 Curtis Building Clinton, Iowa	AB-3-54
I want to know more about Curtis New London American flush doors. Please send literature.	er and Curtis
Name	• • • • • • • • • • • • • • • • • • • •
Address	
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New welded double insulating glass now available in Andersen Casements and Flexivents

Newest development in double insulating glass is now available exclusively in Andersen Casement and Flexivent Wood Window Units.

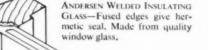
The two panes of glass are hermetically sealed with the edges electrically welded or fused by a recently perfected process that requires no metal or other bonding material.

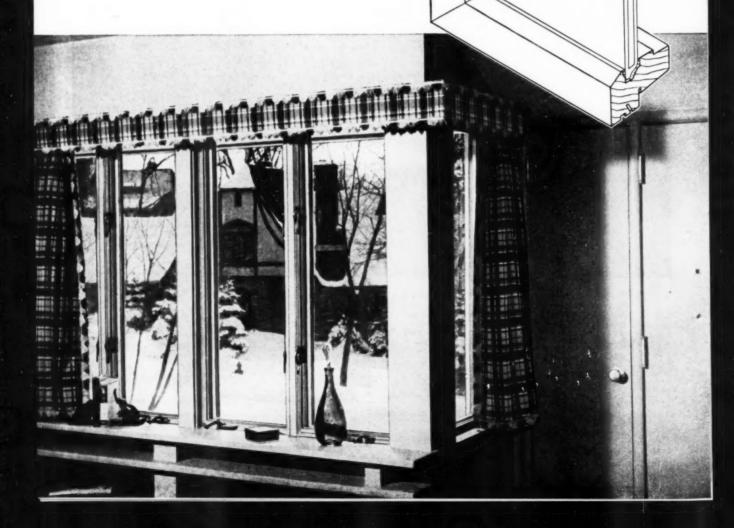
Welded Insulating Glass is optional in all the one-light Andersen Casement sash, and in all Flexivent Unit sash.

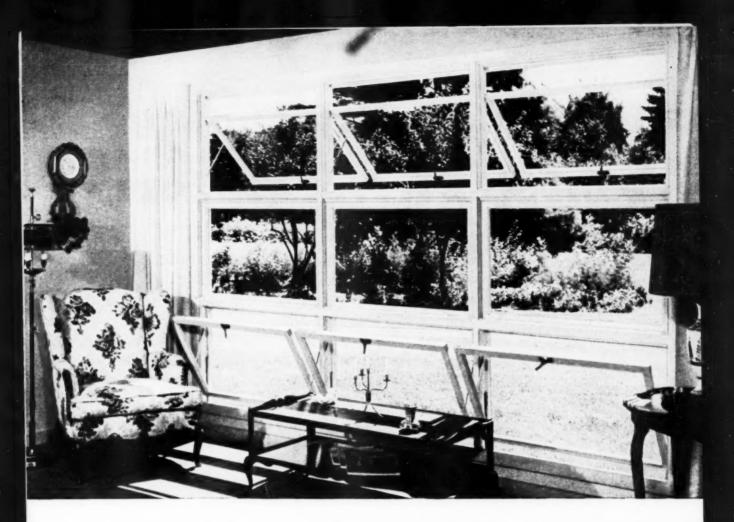
For specification data see your millwork dealer, Sweet's Light Construction File or write Andersen Corporation. WINDOWALLS sold by established millwork dealers throughout the United States including the West Coast.

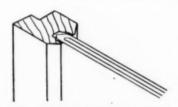
Andersen Corporation

BAYPORT, MINNESOTA









IMPROVED GROOVE GLAZING

A new system—groove glazing—is used with Andersen Welded Glass. It eliminates face putty and glazing stops, gives a stronger, tighter, better looking job.

Elastic glazing material is laid in the grooves. Sash members are then assembled and clamped around the Welded Glass.

Welded glass cuts cleaning in half; ends handling and storage of storm sash

Andersen Welded Insulating Glass offers two big advantages to homeowners. Most important is elimination of handling and washing of removable storm panel or sash. In addition, homeowners enjoy insulation of double glazing the year around.

Two panes of quality window glass are fused together at the edges to make a perfect all-glass seal with no metal or other bonding material. Air between panes is removed and replaced with dried air pressurized to withstand atmospheric pressure in all parts of the country except areas of over 3000 feet altitude.

The coefficient of heat transmission for Andersen Welded Insulating Glass is .675 BTU under standard conditions as compared to 1.13 BTU for single glass.

*TRADEMARK OF ANDERSEN CORPORATION



for top quality ceilings PLASTER... reinforced

Large residential ceilings require quality construction for lasting beauty.

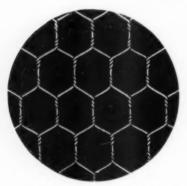
You get top quality by using plaster reinforced with Keymesh galvanized woven wire lath . . . applied to gypsum or insulating lath.

This network of multi-directional galvanized reinforcing wire adds greatly to the strength of ceilings. It also helps assure a uniformly full thickness of plaster over the entire ceiling. It guards against cracking. And, where radiant heating is installed in ceilings, Keymesh helps give more uniform heat distribution, as well as accelerating it.

Some architects and builders want this same strength and quality on walls as well as ceilings. Others find that Keycorner applied to inside corners, wall-ceiling junctures and points of weakness, and Keybead at outside corners, give them the quality they require.

That's why the Keystone system of plaster reinforcement is called—3 Keys to Stronger Plaster.

3 KEYS TO STRONGER PLASTER



Keymesh, woven wire galvanized reinforcing lath has been proved through the years as a superior reinforcement for stucco. Now plasterers are recommending it for ceilings to increase strength and protect against cracking.



Keycorner, woven wire galvanized reinforcing lath is preformed to fit accurately and snugly in corners and at wall and ceiling junctures. It also is ideal where strip lath is required . . . doesn't rust . . . eliminates waste.



Keybead combines open-mesh reinforcing lath with a precision-formed galvanized steel bead. It assures a solid plaster corner, reinforced with a network of galvanized wire that is strong and prevents rust streaks.

KEYSTONE STEEL & WIRE COMPANY

Peoria 7, Illinois



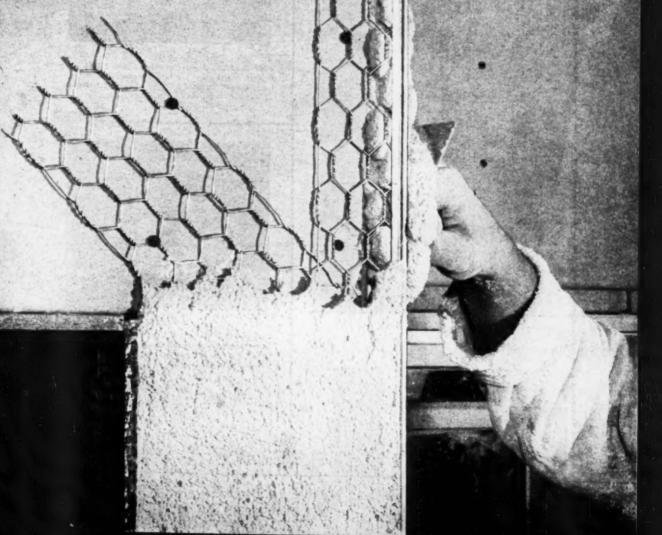
KEYMESH • KEYCORNER • KEYBEAD • KEYSTONE NAILS • KEYSTONE TIE WIRE KEYSTONE NON-CLIMBABLE FENCE • KEYSTONE ORNAMENTAL FENCE



2d 11a 3d

with KEY MEST

GALV WITE ON BUILDING



NOW! Add more strength...more beauty...more sales appeal when you build with

SHEETROCK

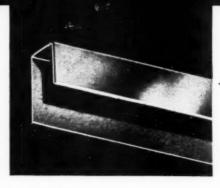
T. M. Reg. U. S. Pat. Off.

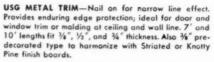
THE FIREPROOF GYPSUM WALLBOARD

Yes, there's a complete line of SHEETROCK accessories to make your dry-wall construction jobs better than ever! With them you're sure of top product performance, backed by a manufacturer with a 50-year reputation of quality and dependability—United States Gypsum. Ask your building supplies dealer for complete details, or write Dept. AB-1, 300 W. Adams Street, Chicago 6.

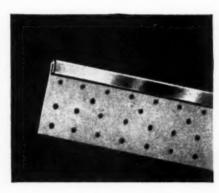
These SHEETROCK Accessories Add "Extra" Sales Features to Every Job!





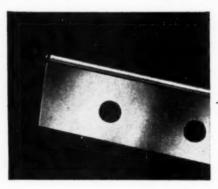






PERF-A-BEAD—Applied and finished with PERF-A-TAPE Cement. Metal bead provides low-cost outside corner reinforcement. Standard 8' lengths; 125-piece jumbo or 25-piece junior cartons.





DUR-A-BEAD—All-metal, nail-on type outside corner reinforcement for maximum strength and durability; true corners. Finished with PERF-A-TAPE Cement. 8' lengths, packed in 25-piece cartons.





United States Gypsum

The Greatest Name in Building

dramatic beauty

for modern living



BEEGEE

modern wood windows

In building or remodeling architects know the easiest way
to increase the charm and value of any home is "window-styling"
with Bee Gee Windows. Proportioned to fit with

modern architectural trends, famous Bee Gee
Windows provide an authentic styling touch for any type of construction...any kind of interior. 179
styles and sizes of all-wood casement,

styles and sizes of all-wood casement,
picture and corner picture windows, skillfully
styled, crafted and detailed to bring new grace and
glamor to every room in your home. And
you can "Clean the Outside from the Inside".



light and airy for health and comfort



Bee Gee Windows open your home to nature's air and sunlight! And Bee Gee's "Pressure Vacuum Ventilation" is scientifically engineered to pull in fresh air from any of 3 directions of wind and exhaust stale air at the same time...the only window on the market to give this truly complete room ventilation.

ouse of installation spells economy



A Complete Window. Ready to Set in the Wall. Nailed in Place. Ready to Use!

BROWN-GRAVES CO. AKRON 1, OHIO

"ribbon-styled"...long—low—beautiful!

New type construction ... designed to emphasize the modern lines of ranch-type and contemporary homes, with all the warmth, character and practical advantages that only wood windows provide.



every window available in 2 styles Style "A"—a brillia structed glass. Sty

STYLE A STYLE A

Style "A"—a brilliant expanse of unobstructed glass. Style "B"—the glass divided to give you long horizontal lines. Choose the style that best fits your home.



BROWN-GRAVES CO. Dept.AB-107, Akron 1, Ohio Please send my FREE Bee Gee Window Catalog with complete data and specifications.

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ADDRESS

CITY ,STATE

Now build exposed beam new 3 in 1 Roof Deck and



1. It's Roof Deck...

Cuts application time as much as 45% or more. Only one material to handle instead of several. New Roof Deck eliminates need for separate roof boards, insulation, lath, plaster and ceiling finishing. In roof sheathing time alone, Roof Deck can save 12 manhours per thousand sq. ft. of surface compared with 2" x 6" D&M roof sheathing.

2. It's Insulation...

2" and 3" thicknesses meet F.H.A. "U" requirements. Inch for inch, Roof Deck provides more than twice the insulation value of wood. 2" Insulite Roof Deck, for example, is comparable to 2" wood deck plus 1" fiberboard insulation. Helps absorb sound, too. Exclusive vapor barrier protects against condensation.

3. And Finished Ceiling!

The underside of Insulite Roof Deck is finished with a white flame-resistant surface at the factory. Simply lay Roof Deck over pre-finished beams and the ceiling is done. No need to plaster, paint, stain or wax. Reduces labor and material costs. Insulite Roof Deck is available in $2' \times 8'$ units, $1\frac{1}{2}''$, 2'' and 3'' thick with or without Insulite's exclusive vapor barrier,

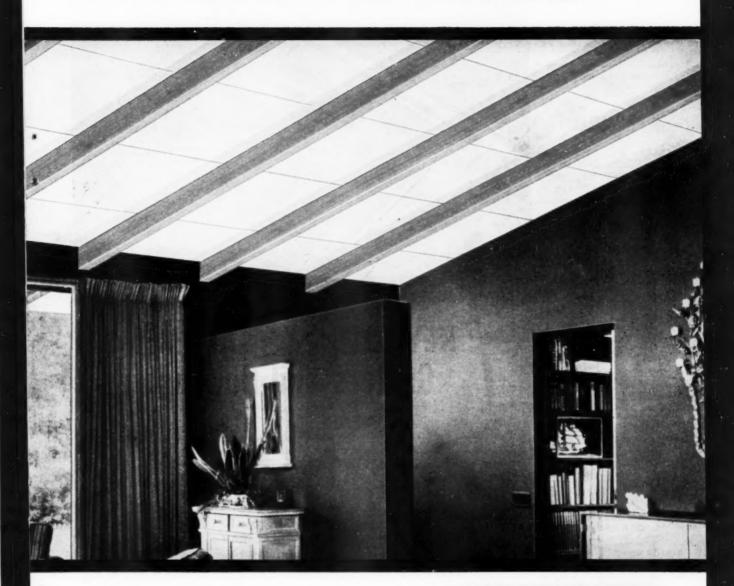
Now! Roof Deck, Insulation and Finished Ceiling in one quick money-saving operation with new

INSULITE.
Roof Deck

158

AMERICAN BUILDER

ceilings <u>anywhere</u> with save '80 to '300 a home!

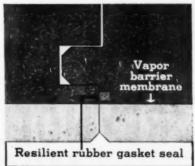


The secret's in the seal! Exclusive vapor barrier lets you build exposed beam ceilings for less, anywhere in the U.S.A. Continuous vapor barrier combines (1) a membrane laminated into each unit, plus (2) a rubber gasket that seals carefully machined T&G joints. Protects against condensation within the deck in any climate. (Also available without vapor barrier for use in moderate climates.)

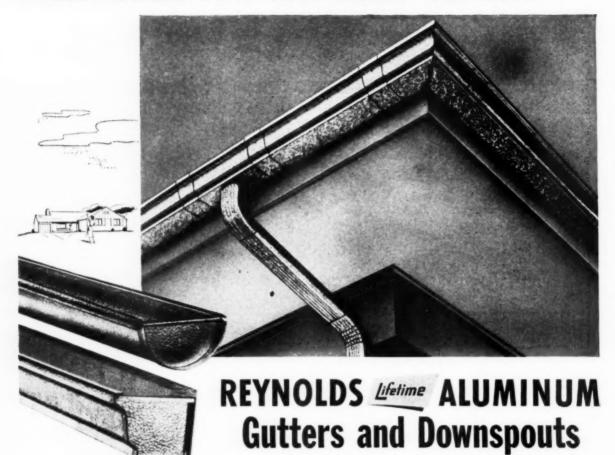
Send for Complete Information Now! Actual on-the-job pictures and construction details show how to use new Insulite Roof Deck to build better for less. Write Insulite, Minneapolis 2, Minnesota.

INSULITE DIVISION, Minnesota and Ontario Paper Company, Minneapolis 2, Minnesota

SULITE IS A REGISTERED TRADE MARK



Visible Sales-Plus that Costs You Less!



To the prospective home buyer nothing says "Quality Construction!" so fast. The soft sheen of aluminum at the eaves instantly signals—quality! Rustproof beauty that needs no painting! Fast installation with slip connectors—no soldering! Lowest in cost of rustproof materials! Add your savings on labor and this visibly superior sales feature actually costs you less than any other gutters. Ogee or half-round, stipple-embossed or smooth finish. Write for literature.

Reynolds Metals Company, Building Products Division, 2003 So. Ninth St., Louisville 1, Ky.



REYNOLDS ALUMINUM REFLECTIVE INSULATION

High efficiency at less cost than most bulk insulations. Perfect vapor barrier. Embossed foil on two sides of tough kraft paper (Type B), or one side (Type C). In rolls of 250 sq. ft., 25", 33" and 36" wide.



Amazingly simple and beautiful sliding window, ideal for the modern home. Precision-made of "Satinized" Reynolds Aluminum. Easiest to install, high rated against air and water infiltration. Vents slide easy, close tight. No sash balances, weights, hinges...no puttying! Wide selection sizes, types.



SEE "MISTER PEEPERS," starring Wally Cox, Sundays, NBC-TV Network.

REYNOLDS ALUMINUM

Get tremendous bracing strength

SAVE 4 WAYS



Apply wood siding directly over Upson All Weather Panel Sheathing. Nails won't pull out. Tests show Upson Panels have 30% greater resistance to nail withdrawal.

6 plies mean super strength—Made by an exclusive process; 6 plies of specially treated wood fibers laminated and bonded together.

Save ... costs less to buy

Your material costs are lower because Upson All Weather Sheathing is priced lower, yet offers you highest quality.

Salve . . . eliminates costly corner bracing

Why pay for material and labor for corner bracing when it's not needed. Super strong Upson Sheathing meets and exceeds requirements of FHA Technical Circular No. 12. Also accepted by the Veterans Administration.

SAVC . . . on cost of application

Reduce application time by over ½ compared with wood sheathing. Save labor costs. Upson Sheathing is easy to apply, nails direct to studs, saws like wood, clean.

Save ... reduce material wastage

A greater variety of sizes to fit your house at no extra cost. Virtually eliminates waste.

more features

- Treated to resist mold, fungi, termites.
 Smooth surface, easily painted. Base color won't bleed through. No special sealer needed.
- Adds insulation value.
- · Moisture content-10% to 12%.
- . No wetting or special treatment 24 hours before application needed.

1934 THE UPSON COMPANY

PROVEN QUALITY YOU CAN TRUST



with Upson All Weather Sheathing

Twice as strong in load tests. Proved best in every test. Carried twice the weight of other materials tested.

Far stronger in racking tests. Tests by the Univ. of Buffalo Engineers showed Upson Sheathing withstood greater stresses than other materials tested.

Over twice as strong in impact tests. Proved more than twice as strong as all other 25/32" sheathing tested.

Waterproofed by exclusive Upson CuraSeal Process.

Waterproofs through entire thickness. Resists water absorption 3 times better than insulating sheathing tested. Store outdoors. Resume work right after rain. snow.



Here Upson Sheathing is used for soffits. Rugged and waterproofed, Upson Sheathing needs no special sealer when used for exterior surfaces.

Soffits cut to size - Think what this means. No cutting on job. Saves time.

No charge for longer lengths - 8' lengths or 20' lengths, price per sq. ft. is the same.

Mail coupon for FREE folder and instruction sheet!

THE UPSON COMPA 113 Upson Point, Loc	
Please rush me FREE Sheet on Upson All V	Folder and Application Instruction Veather Sheathing.
NAME	
NAME OF FIRM	
ADDRESS	

Better Homes and Another Record-Break

The 1954 Home for All America

It fits any climate zone, any family group, any design taste, any materials

TO BE ERECTED BY TOP BUILDERS ALL OVER AMERICA

Chicago, Ill., Jan. 19. At the 1954 convention of the National Association of Home Builders, the editors of Better Homes and Gardens presented the BH&G HOME for ALL AMERICA to approximately 400 builders and manufacturers from all parts of the country.

Using color slides and scale models, John Normile, building editor of BH&G, stressed the fact that this home presents advantages rarely found in model homes. Of contemporary design, the home is unusually flexible, practical, and of striking appearance. The scale models showed how, on one basic design, the home can be adapted to fit any climate, to suit any family group, any design taste, and any materials.

Promotion expected to exceed 1953 record-breaking success

Within 24 hours of the presentation, more builders had signed to build the HOME for ALL AMERICA than the total participation in the 1953 promotion—visited by over 1,000,000 people.

A much more extensive promotion will back up the 1954 home.

FACTS ABOUT 1954 HOME AND PROMOTION

The 1954 HOME for ALL AMERICA was designed by Robert Little, A.I.A. of Cleveland, Ohio. It answers the needs and desires of most families, regardless of where they live. Its flexibility enables builders in all areas to adapt it as the model home to promote more sales in 1954.

The HOME for ALL AMERICA will first be shown to the public in the September issue of Better Homes and Gardens, on sale August 25, and will be read by over 3¾-million BH&G families—guaranteeing that tremendous numbers of top prospects will view the home in September.

Builders are offered exclusive rights to build and finance the home in their cities. Along with the HOME for ALL AMERICA feature in the September issue, two full pages will list all builders' names, and addresses of their homes. In each city where the home is built, newsstand copies of the September BH&G will carry a special tab on the cover featuring the name of local builder and address of home.

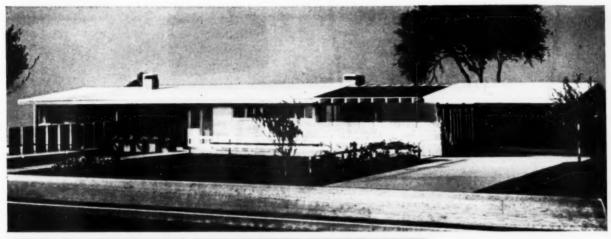
Builders will be supplied with 10 copies of the September issue—newspaper mats—radio and TV spots—publicity releases—special display pieces—suggested site and directional signs—special mailings to all subscribers in the area (at cost)—miniature BH&G cover folders (at cost). IN SHORT, EVERY-THING THE BUILDER WILL NEED FOR A MOST SUCCESSFUL PROMOTION!

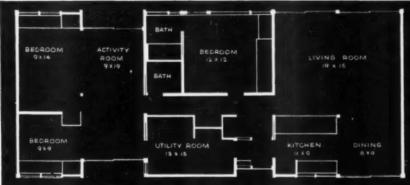
MEREDITH PUBLISHING COMPANY, Des Moines, Iowa

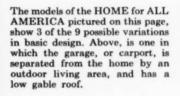
Get the exclusive franchise

Rush inquiries to Better Homes & Gardens

Gardens Announces ing Home Promotion!







The home with the high gable roof (lower left) is suggested for areas where local conditions and preferences demand this style roof. This version features an attached garage.

For some areas, the flat roof may be a more popular design (lower right). Here the carport is located in front of the home, separated by the outdoor living area.

The home has 1,415 sq. ft. of floor space arranged to achieve maximum livability. 3 bedrooms, large activity area, 2 baths, utility room—all features combined to make the HOME for ALL AMERICA, the home for most any family, in any area.





for your city immediately.

"Home for All America" Promotion,

Des Moines, Iowa!

Sales-Condition

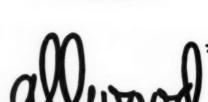
the homes
you build
with...











swery builder should know:

- ...walls and ceilings of Allwood Hardboard go up fast — provide economy without loss of quality.
- ... Allwood won't shatter, split or crack. It's grainless—equally strong in both lateral dimensions.
- ... Allwood resists abrasion and moisture maintains dimensional stability.
- ...Allwood is buyer-preferred for good looks and long wear.

HARDBOARD

Allwood Hardboard brings built-in sales appeal to every home you build. You can start NOW to gain economy, efficiency and extra versatility on the job. Allwood saws, nails, drills, works like wood because it is wood. It bends for special effects.

Get full details from your dealer on sizes and densities available. If he does not stock Allwood, send us his name. Our jobber will call on him.

DEALERS! Find out TODAY how you can profit from the spreading demand for Allwood Hardboard. Call in your jobber... or write directly to us for information.

Speed door and window finishing with John Day Packaged Trim — Grade A Ponderosa Pine...flawless pieces cut to correct length. Ask your dealer about it ...or write for information.

OREGON LUMBER CO., BAKER, OREGON





Oregon Lumber Company

Hardboard Division
DEE, OREGON

BURNS 'father and son' team conducts rehabilitation experiment FINDS IT PAYS

American Builder's Four-Point Program as outlined in the January, 1954 issue foresees a bright future for the nation's builders. New dollar volume highs are within reach through aggressive action in selling new construction, merchandising of trade-ins, remodeling and rehabilitation. Under point four, this magazine suggests that builders train crews and gather vital information now to help combat America's biggest housing problem—the ever increasing inventory of substandard dwellings

In Los angeles "Two Old Dowagers" are undergoing some mighty significant changes despite their 70 odd years of age. Fritz Burns, builder-realtor, and his son Pat are rehabilitating two old structures into duplex apartments. Though the job is only partially completed, it already points up the feasibility of new-conditioning worn out structures. Burns, noted anti-slum fighter (chairman of NAREB's Build America Better Council), is training a crew in rehabilitation work. He also is gathering vital dollars and cents statistics that will aid his operation and his personal crusade against decayed housing.

Recently the builder purchased several blighted structures in Los Angeles' Bunker Hill section. The houses, built in the 1830's, were once fashionable homes in the elite section of the city. Age and shifting population trends have taken their toll, and today the structures, located in the heart of a blight area, stand shorn of their previous magnificance.

The actual rehabilitation work was turned over to Pat Burns, Fritz Burns' son. The first structure that Pat modernized was originally a nine-room, two-story, single-family unit. Pat converted the house into two 1,000 square-foot apartments with rental values of \$85 a month for each unit. The structure was purchased by the Burns organization for \$6,000. Rehabilitation costs of \$8,000

square-toot apartments with rental values of \$65 a month for each unit. The structure was purchased by the Burns organization for \$6,000. Rehabilitation costs of \$8,000 brought the total investment to \$14,000. The gross rental (\$170) and total investment (\$14,000) compares favorably with the old rule of thumb adage that income property rentals should be figured at one per cent of the investment per month.

Rehabilitation of the Building

The structure was in a bad state of disrepair because of age and neglect, rather than poor material and workmanship. The original framing and siding were redwood and in sound condition. However, the few pieces of siding and trim that needed replacing presented a supply problem—manufacturers don't produce the same patterns today. Pat solved this problem by scouring wrecking yards where he was able to secure duplicate patterns at a fraction of the cost of new material.

The rehabilitation and conversion was intelligently planned. No attempt was made to change the architectural lines or the exterior of the facade, and this is the basic difference between rehabilitation and remodeling. This house was brought back to livable standards without major, prohibitive cost changes.

Another entrance is the only exterior change. Paint did wonders to give the house a new look. Major exterior construction was limited to a new covered porch, because the original porch was beyond repair.

Simple Changes to Floor Plan

Partition changes were held to a minimum in the conversion to two apartments. The first floor apartment occupies the area of the original living room, dining room, breakfast room, kitchen and two pantries. A portion of the dining room became a bedroom. Closet space was provided by erecting a partition around the old sliding doors between the dining room (now bedroom) and the living room. Baths for the first floor apartment were installed in one of the pantries and a large closet under the stairs. The second bedroom occupies the area of a pantry and the dining room. To build the second bedroom two partitions had to be removed and two new ones built. The new partitions, placed to increase the area of the room, cut into the original area of the dining room and kitchen.

The second story apartment also had few interior par-

Burns Rehabilitation Experiment— (Continued from page 165)



Before: These are the "Two Old Dowagers" being rehabilitated by Fritz Burns and his son, Pat. Although both houses are more than 70 years old. their structural soundness made rehabilitation a practical matter

Simple rehabilitation with few ex terior changes has given this house a complete "new look." This experiment demonstrates effectively that modernization of older structures is economically sound





This is the typical foyer of houses built in the late 19th century. The builder was able to make separate entrances to the duplex apartments by putting a partition next to the stair



tition changes. The portion between the original bedroom and parlor was removed to make the new living-dining combination. The old upstairs bath was enlarged to make the new kitchen, and the new bath was installed in two hall closets. The tub and lavatory were installed in one and a headered opening was cut through the wall between the two closets for access to the toilet.

Modern Products Speed Repair Work

To speed the job and to hold costs, the builder used

many products highly adaptable to repair and modernization work. Plasterboard was installed over all the old plaster walls as a time-saving operation. Floors were sanded and covered with linoleum and cork tile instead of replacing some of the bad pieces. Plastic-coated hardboard panels were installed on the bath walls. The kitchens for both duplex apartments were modernized with packaged sinks and cabinets. A garbage disposer, ventilating fan, gas stove and gas refrigerator also were installed in the kitchen. Individual gas-fired, wall-type

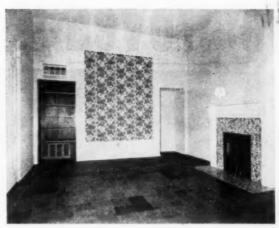


The before and after floor plan shows the use of the existing space. Few partition changes had to be made to provide the two 1.000-square-foot apartments

heating units were installed in both apartments.

City Helps Builder Plan Conversion

Los Angeles Building and Safety Department, one of the nation's leading city agencies charged with slum rehabilitation and prevention, recommended changes that would bring the house back to habitable standards. The free service included inspections that would determine what repairs would need to be made, as well as blue printing the new floor plan arrangement.



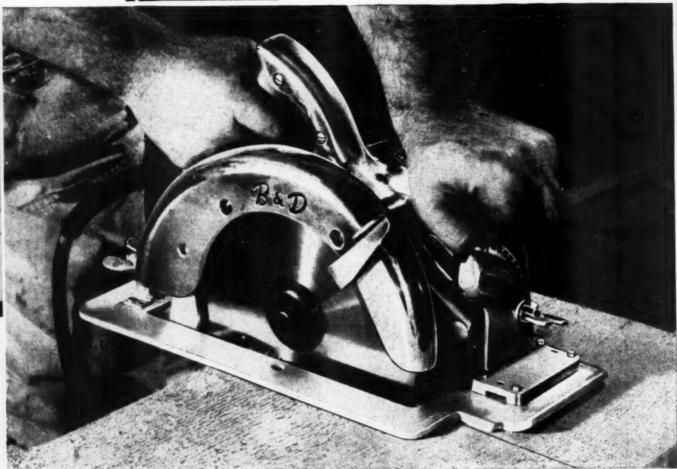
A new partition was built at the end of the living room to make closet space in the adjacent bedroom. Sliding doors between the two rooms were left intact. The gas-fired wall furnace grilles can be seen at left alcove. Floor is cork tile. The fireplace was not changed

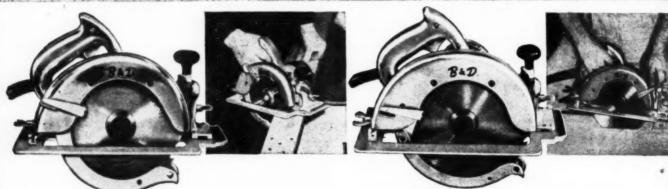




The typical old kitchen (top) had α thorough rejuvenation to make room for modern conveniences. Packaged units were used to speed the work

We proved it to Zehman &





NEW B&D 8" HEAVY-DUTY UTILITY SAW

NEW B&D 9" HEAVY-DUTY UTILITY SAW

ALSO: New B&D 6" Adjustable Saw...\$64.50 and New B&D 7" Saw...\$84.50::1 Both Heavy-Duty Saws with all the Features Described Above.

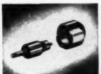
Wolf - we'll prove it to you!

NOW! BLACK & DECKER Saws give you every feature you want for every job you do!

Zehman & Wolf Construction Company of Cleveland, Ohio, hires as hard-hitting and hard-working a crew of carpenters as any you'll find. We felt that these men would be the best judges of saws, so we took a new B&D Heavy-Duty Saw out on the job and asked them to try it. And did they give it a workout! They made rip cuts. cross cuts, box cuts and bevel cuts with it. They hefted it for weight, tried different depths of cut, balanced it, used it right-handed, left-handed-with one hand and with two. And when they were finished, they were sold! They were sold on the power of the new B&D Saw . . . on its features . . . on the amount of work it gets through. As Carpenter Hy Weltman put it: "The new B&D Saw has a lot of power and it's easy to use. Not only is the lever on the lower guard a good safety factor, but all of B&D's new features make it a great help."



at natural sawing angle plus extra hand-hold, and cord is out of the way!



toughest jobs . . . motors shoe . . . for solid base, are B&D designed just for greater stability at any these saws!



depth or angle!





EASY-GRIP HANDLE . . . POWER TO SPARE . . . for HUSKIER BUILD . . . larger 2 - POINT SUSPENSION SAFETY-LIFT GUARD not one but two big large guard lift-lever big trigger switch, heavy wing nuts hold saw steady lets you retract lower wing nuts give faster acat every depth and angle! guard by hand safely!



MAN-SIZE CONTROLS... tion, quicker adjustments!

PROVE IT YOURSELF GET A CHANCE TO WIN \$1,000.00

AT YOUR DEALER'S! See and try the great new Black & Decker Saws yourself, soon . . . AND GET A CHANCE TO WIN \$1,000.00 at the same time! Just ask your building supply or hardware dealer to show you the new B&D Saws. Watch him demonstrate them. Try them yourself. Note their many features. Then get an official entry blank. Fill it out, following the easy directions, and leave it with your dealer. He'll do the rest . . . and you'll be in line for the grand prize . . . \$1,000.00 . . . or one of the many other cash awards. See your dealer right away quick! For dealer nearest you, see where-to-buy-it section of local phone book, under "TOOLS-ELECTRIC."

RIGHT ON THE JOB! To make the big B&D Saw Contest even easier for you to enter, we'll arrange to have the new B&D

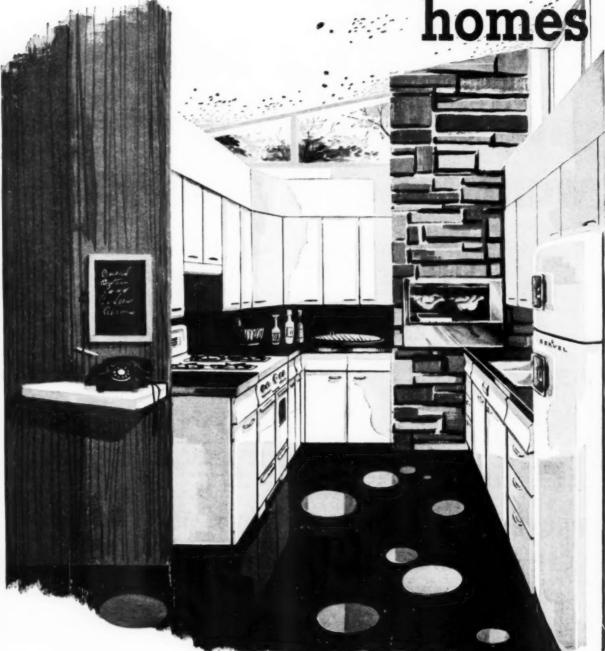
Saws brought right out to your job site, demonstrated to you, let you try them yourself! And you'll get your official contest entry blanks right then and there. To arrange for this, just fill out the handy coupon below and mail it to us today!

For address of nearest "TOOLS - ELECTRIC"



I want to see No obligation	and n, of	cou	rse	he e!	n	ev	V	B	&	D	S	a	W	8 1	ri	gì	nt	0	n	r	n	y	jo	k
Name														. ,		*					ĸ			*
Company																								
Address									*															
City						Ze	n	e.			S	ta	te	е.										

When it comes to development homes



On three grounds – price, performance and appearance – Gas appliances belong in your development homes. They cost you less to install (and cost your purchasers less to use them). They operate more efficiently because Gas is both flexible and instantaneous. And they sell on sight! For the new Gas ranges are so automatic they cook whole meals all by themselves.

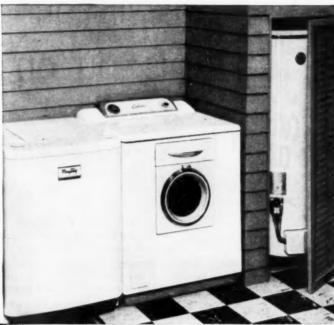
The new Gas refrigerators are so automatic they feed ice cubes into a basket all by themselves. You can talk about, boast about, even write ads about your all-automatic Gas kitchens. They're the plus that can turn prospects into buyers and buyers into happy homeowners. And they make your own margin of profit that much bigger.

... nothing makes as much sense as Gas

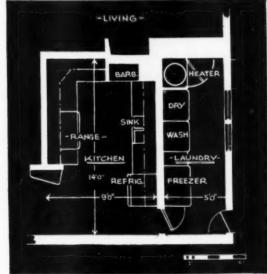
This New Freedom Gas Kitchen* features an automatic Gas range, made to "CP" standards by the Hardwick company.

Royal Wood cabinets by the Mengel Co.

Kitchens sell homes, and this Servel Gas refrigerator certainly helps sell a kitchen. It puts ice in a basket automatically, does away with messy trays. Few women (and not a man in the world) can resist it - or the home that has it.



Bryant automatic Gas water-heater: Caloric automatic Gas clothes dryer.



The Gas clothes dryer is another extra that frequently clinches a sale. Most development home purchasers have heard of it, read about it, dreamed about it, but few ever thought it would really be theirs. (If you're considering any dryer but Gas, just remember that professional laundries prefer Gas dryers 30-1.) The Gas water-heater is demonstrably superior. Not only does it cost less to install and use, but a 30-gallon tank actually delivers more hot water than an 80-gallon tank run by any other all-automatic fuel. Gas-dependable, efficient Gas-is 3 times faster.

AMERICAN GAS ASSOCIATION

Your local Gas company will be happy to work with you on any problem.

Only Gas



costs so little to install and operate

GAS-the modern fuel for automatic cooking . . . refrigeration . . . water-heating ... house-heating ... air-conditioning ... clothes-drying ... incineration.

MARCH 1954

ANOTHER PROJECT
JONES
CONSTRUCTION
COMPANY

how many will you miss out on

... AND WHY?

No one can get 'em all. What's important is, will you have the opportunity to bid? You can't get any of them unless you try.

This is sure, with keener competition you just can't afford to miss out on any jobs because you heard about them too late or never hear about them at all.

The one sure way to know at the right time where the jobs are, the way proven for over 60 years by most of the leading firms in new construction, is to use Dodge Reports. Wherever you are in the 37 Eastern States Dodge field men spend all their time investigating new business opportunities for you in the new construction market.

You can have all the business you want if you know where the jobs are . . . at the right time. It's your business to figure, bid and sell...it's Dodge Reports' business to find the jobs and tell you where they are so that you can sell them. There's just no other way to make the most of all the opportunities coming up every day in new construction. There are just too many people to see, too many miles to cover, too little time.

Why not take a look at some typical Dodge Reports covering work right in your territory. We'll gladly let you see them and send along our informative book telling how others use Dodge Reports profitably. Timely, accurate, daily Dodge Reports are backed by the nation-wide facilities of the Dodge organization.

Make sure that from this day on you don't miss out on any jobs you want.

Write today for book. No obligation.



DODGE REPORTS

TAKE THE FIRST STEP IN EVERY SALE Dept. AB-354, 119 W. 40th St., New York 18, N.Y.

Timely, accurate construction news service East of the Rockies CORPORATION





It had to happen. Today, a knowledge of color harmony is an indispensable tool for every builder of new homes or for remodeling. And . . . now, Ruberoid offers you a tool to make exterior color-styling sure and easy . . . and an idea to help you turn the sales magic of color into profits.

You can't ignore the growing demand from a colorconscious public for exterior color styling to match the advance of interior decoration. Ruberoid helps you turn this challenge into a sales opportunity. only with a complete line of roofing and siding shingles in decorator colors . . . but with a working tool to turn color theory into sales.

Ruberoid's popular Color-Grained Asbestos Siding offers an appealing choice of decorator colors with a "shake"-textured surface. It saves you money, too . . . as much as \$650 on an average home with 15 squares of siding. Color-Grained Siding's *Duroc* protective finish enriches the color, resists dirt, stains and weather

Ruberoid Asphalt Shingles in either regular Thick Butts or famous interlocking Tite-Ons are heavily sur-faced with mineral granules in a wide range of harmonizing decorator colors and blends.

Millions of homeowners . . . and most of your customers and prospects . . . will see these well-known Ruberoid products advertised soon in The Saturday

Evening Post, Better Homes & Gardens and Good Housekeeping. They'll be alerted to the new trend in roofing and siding through the Ruberoid Color-Styled Home idea.

Here's how to put these color-styled products together into sales-winning combinations . . .

The RUBEROID Colorator

color confusion . . . turns complicated color theory into simple terms, showing Ruberoid roofing and siding colors in pleasing combina-tions with suggested trim and accent colors. It not only dramatizes exterior color styling, it's a practical, easy-to-use working tool . . . and sales tool. Your Ruberoid dealer has a Colorator for you to see and use. If you'd like your own Colorator Selector, just send the coupon below.



The RUBEROID Co., Dept. A, 500 Fifth A	ive., New York 36	, N. Y.
Please send my f	ree copy of the R	uberoid Colorator.
YOUR NAME		
COMPANY	-	
ADDRESS -		
CITY	ZONE	STATE

The RUBEROID Co.

Asphalt and Asbestos Building Materials



A Fitting Combination

for saving time and cutting costs

The round cornered hinge and the portable electric mortiser go together. You'll cut hours off your door hanging days with this fitting combination. It's a natural.

Time is saved around these corners

Stanley Round Cornered Hinges are available in any size or finish; in plain joint or ball bearing, regular weight or extra heavy.

Stanley Round Cornered Hinge leaves and pins are completely interchangeable.

Stanley Round Cornered Hinges fit the mortise made by the portable electric mortiser — they fit exactly and uniformly.

Stanley Round Cornered Hinges COST NO MORE!

Costs are cut by this kind of portable power

The Stanley Hinge Mortiser routs out perfect mortises in less time with less work. Using this mortiser and the template shown here, even an unskilled carpenter can mortise 75 doors and jambs a day.



No. HB8A Router and No. T3 Template

This Stanley Electric Plane has a hundred uses for the busy builder. Wide enough to plane surfaces up to 21/2", the spiral cutter works smoothly with or against the grain and won't splinter edges. The planed surfaces are ripple-free, whether cut is tissue thin or as much as 3/16" deep. Here's a real work-eater. Stanley service stations everywhere . . . list of addresses packed with every tool. Put this door-fitting team to work for you. Call your wholesaler or write Stanley today.

No. J5 Plane



THE STANLEY WORKS . NEW BRITAIN, CONNECTICUT ELECTRIC TOOLS . HARDWARE . STEEL STRAPPING . STEEL



cut QUICK, NEAT switch box holes in drywall with





The male cutter snapped in switch box





Insert cutter-SQUEEZE HANDLES TOGETHER





- * ELIMINATE PATCHING
- * SAVE TIME
- * DO A PERFECT JOB EVERY TIME
- NOW—in just a few seconds—you can cut neat, quick, switch box holes in drywall. Every hole is perfect. There's never any need for a follow-up patch job-all this time is saved.
- The Quickutter cuts single, double or multiple holes with equal ease, every hole perfect, with no splitting of the back of the sheet, and no damage to the paper facing on either side.
- The Quickutter is rugged—built for long years of service. In extensive tests, over 1,000 perfect holes were cut in an 8-hour day!
- Follow the easy steps in the pictures at the left—then add this valuable time-saver to your tools.
- Complete with 1%" Misener hole saw (fits any standard brace), with one single and one double cutter die... \$24.95

 (Quickutter \$21.50, Saw \$3.45)

This tool is sold ONLY on a moneyback guarantee if not as represented.

See your dealer or order direct

FILL OUT THIS COUPON AND MAIL TODAY! NO COD

HARTMEISTER MFG., INC. Room 1, 2020 W. Barberry Place Denver 4, Colorado

Enclosed is \square check \square money order for which send me one Quickutter, Misener hole saw, and the single- and double-box cutters. I understand this will be shipped prepoid. No C.O.D's, please,

PLEASE PRINT

Orders shipped in the order in which they are received.



AND SELL YOUR HOUSES FASTER

A proven fact! Ask any builder who installs BILCO Doors. He'll tell you it's the best selling feature he ever used. Home buyers sign up fast when basements are useful, livable and safe. Don't "date" your homes — investigate America's fastest growing building product . . . the BILCO all-metal permanent door.

Direct access to the basement eliminates tracking mud and dirt through the upstairs rooms. Countless steps are saved by repairmen, servicemen and the home owner. It's the only means of installing big equipment necessary for a work shop, recreation room or extra living room.

Check all these Bileo Benefits!

ECONOMICAL! LIFE-TIME DURABILITY! WEATHER-TIGHT! FIRE-PROOF! BURGLAR-PROOF!





THE BILCO CO., 109 HALLOCK AVE., NEW HAVEN, CONN.

Please send me complete information on the BILCO DOOR, sizes, prices and dealers' names.

	 nite	at but	cos and	Genia	ns mames.
I build	10 or less		10-100		100-500 houses
NAME_					

ADDRESS

CITY____STATE___

Catalogs -

and Manufacturers Literature

476-VENETIAN BLINDS -attractive new 20-page catalog presents in picture-caption form the advantages of "Flexalum" blinds, including product's reaction to bend. immersion, salt spray and other tests, Operating mechanism and vinyl plastic cord are described, Decorating possibilities for multiple, bay, double, picture, high and kitchen windows are given, plus suggestions for use with single or double doors. Hunter Douglas Corp., Dept. AB, 150 Broadway, New York 38, N.Y.



Glaborod

Reduced

Reduced

Fig.

page catalog presents Malarkey redwood and fir Shadowood plywood, lumber and matching moldings in full color. Properties, specifications, suggested finishes and uses are included. Shadowwood pattern has been given to t&g lumber; paneling is ½ inch thick, six or eight inches wide, and comes in 8-, 12- and 16-foot lengths. M and M Wood Working Co., Dept. AB, 2310 N. Columbia Blvd., Portland 17, Ore.

477 — REDWOOD AND

FIR PLYWOOD - eight-

478-ATTIC FANSstandard residential-type fans designed for homes with low pitched roofs are made in four sizes of 24, 30, 36 and 42 inches. Panel-type units are made in eleven models for residential, commercial and industrial applications. Both are described in four-page folder containing complete specifications and dimensions of residential and panel units. Installation shown in picturestep form. The Lau Blower Co., Dept. AB, 2001 Home Ave., Dayton 7. Ohio.



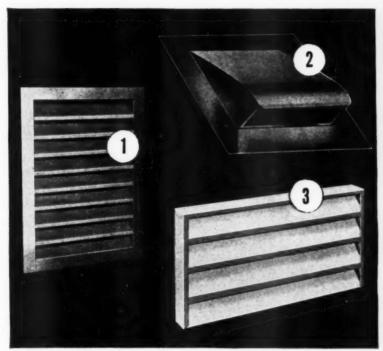


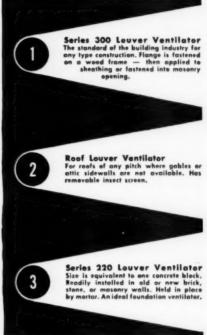
479 — PLASTER AGGRE-GATE—illustrated eight-page brochure, "How to Specify and Use Perlite Plaster Aggregate," contains helpful specification data, information on the perlite industry's certification and labeling program for plaster aggregate and practical hints on the cause and prevention of cracks in all types of plaster. Product is guaranteed to meet ASTM requirements. Perlite Institute, Dept. AB, 10 E. 40th St., New York 16, N.Y.

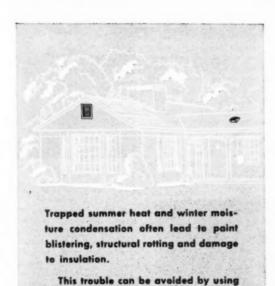
FOR MORE INFORMATION USE COUPON, PAGE 202

MILCOR Louver Ventilators

made of durable non-streaking galvanized steel to give lasting satisfaction







Milcor Louver Ventilators — the low-cost way of drawing off moist, dead air and

supplying fresh, dry air.

Here's low-cost ventilation for any home in a size and type for any construction

Architects, Ventilating Engineers, and Insulation Contractors know that every home needs Milcor Louver Ventilators:

- for cooler comfort in summer.
- for protection from condensation in winter.

And here are six more reasons why Milcor Louver Ventilators are first choice:

Low in cost — yet they provide valuable all-weather ventilation for any home.

Durable — Milcor Louver Ventilators are made of heavy galvanized sheet steel with reinforced louver blades that won't loosen or rattle.

Wide range of types and sizes
— for wood, concrete block,
brick, stone, or concrete construction.

Convenient—all types are available with a separately framed, removable insect screen — an extra-quality feature.

Scientifically designed — to provide the most efficient cross ventilation possible as well as attractive appearance.

Easy to install — thanks to generously fitted corners and overlaps. Ideal for both old or new construction.

Insist on Milcor Louver Ventilators for the homes you build or remodel. You give the home owner long-lasting protection and build a reputation for fine work.

<INLAND>STEEL PRODUCTS COMPANY

4025 WEST BURNHAM STREET . MILWAUKEE 15, WISCONSIN

BALTIM 3RE 5, MD., 5300 Pulaski Highway — BUFFALO 11, N. Y., 64 Rapin St. — CHICAGO 9, ILL., 4301 S. Western Blvd.—CINCINNATI 25, OHIO, 3240 Spring Grove Ave. —CL. VELAND 14, OHIO, 1541 E. 38th St. —DETROIT 2, MICH., 690 Amsterdam Ave. —KANSAS CITY 41, MO., P. 0. Box 318—LOS ANGELES 58, CALIF., 4807 E. 49th St. —NEW YORK 17, N. Y., 230 Park Ave. — ST. LOUIS 10, MO., 4215 Clayton Ave.

*Reg. U. S. Pat. Off.

5-1238



The Miracle 'Thin-Set' method of installing tile has been proven in thousands of installations in bathroom units and all kinds of other ceiling, floor, counter, and decorative areas, since 1937.

- You quickly, permanently install tile over gypsum board, plaster, plywood, cement asbestos board, and concrete-vertical or horizontal surfaces.
- You don't need heavy construction equipment or bulky setting materials. The Miracle 'Thin-Set' method reduces dead weight 12 lbs. per sq. ft. You cut way down on weight of materials to be transported, stored, hoisted, and handled.
- You speed jobs substantially. You use more economical base materials. You cut costs as much as 20% per job!
- All your setting material supplies may be secured from Miracle Adhesives Corporation: leveling, priming, setting, grouting, and caulking made by Miracle Adhesives Corporation to work together to give you best possible jobs at lowest possible costs.



Important: Be sure the adhesive you use bears this hallmark, as issued by the United States Department of Commerce. Miracle Tile Cements comply with all Commercial Standard Specifications for "water resistant organic adhesives for installation of clay tile"



Catalogs

480 - ALUMINUM WIN-DOWS-eight-page bulletin describes these pre-assembled, 'engineered" window units. featuring controlled ventilation, quick installation, allweather sill, sash removable from inside, box channel construction. Standard doublehung windows are listed in types and sizes, with diagrams showing mullions, installation details for various types of wall construction. Typical installations are shown. Fleet of America, Inc., Dept. AB, 110 Pearl St., Buffalo 2, N.Y.



482 — BUILDING PROD-UCTS—48-page catalog in full color contains complete information on the company's line of metal building products-metal awnings canopies, mail boxes, package receivers, etc. It contains the first information available on many new products, including pocket door hardware, sliding towel racks, roller drawer guides and miniature ventilators. Sizes, weights, installation requirements included. Leigh Building Products Div., Air Control Products, Inc., Dept. AB, Coopersville, Mich.





481 — LIGHTING FIX-TURES - 12-page catalog lists manufacturer's complete line of recessed fixtures for residential and industrial use; 40 units are illustrated, with dimensions, wattage, framingin details and trim size. Frames, guards and other accessories are listed. Typical installations of fixtures are shown, as well as features of manufacturing processes. Prescolite Mfg. Corp., Dept. AB. 2229 Forth St., Berkeley 10, California.



483 - LAMINATED PAN-ELING-called Novoply consists of a new all-wood material combining the plywood principle of laminated construction with the use of resinimpregnated wood fibers. Described in this 12-page catalog containing line drawings and photographs showing physical characteristics and applications, product offers economy. beauty, flatness and stability. plus easy fabrication. United States Plywood Corp., Dept. AB, 55 W. 44th St., New York 18, N. Y.

FOR MORE INFORMATION USE COUPON, PAGE 202



with a FORD Tractor and Dearborn Equipment

Here's a low cost power unit with the right capacity to work on a wide range of earthmoving and material handling jobs . . . jobs that are too big for hand labor, yet too small to justify the use of heavier equipment.

POWER FOR MORE JOBS

There's almost no end to the jobs the Ford Tractor can be equipped to do economically. One day you can use it for loading, grading or backfilling. The next day you can use it for excavating, ditching or digging foundation footings. It's a time-saver on construction clean-up work. Dearborn Equipment to handle these and other jobs attaches quickly and easily.

The Ford Tractor is highly maneuverable, too. It speeds from one job to another-needs no trailer for transportation. And attached equipment rides on the tractor-operates hydraulically with the touch of a finger.

POWER THAT COSTS LESS

For all it has and for all it can do, the Ford Tractor is priced surprisingly low. You get lower operating cost, too . . . Ford's low friction engine saves on gas, oil and upkeep expense. And wherever your work takes you, you'll find Ford parts and service available nearby. So, with your work season just starting, take time right now to find out how this all-round power unit can produce more profit by staying busy on more jobs. Try it on your own jobs, without obligation. See your local Ford Tractor Dealer or write to the address below.

TRACTOR AND IMPLEMENT DIVISION FORD MOTOR COMPANY

Birmingham, Michigan



GRADE



BACKFILL



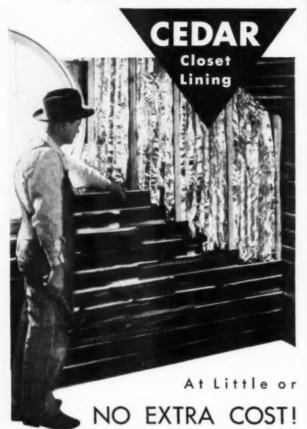




Build Closets Faster

WHEN YOU USE BROWN'S

SUPERCEDAR



SUPERCEDAR can be nailed directly to open studding and eliminates the cost of plastering and pointing. Houses sell faster, too, when they have the "custom-built" feature of cedar lined closets—yet, this saleable beauty costs you practically nothing extra SUPERCEDAR is genuine aromatic red cedar with 100% oil content. Nationally advertised and guaranteed. Seal packaged in 4 and 8-foot bundles.



Catalogs

484—DOOR HARDWARE

—line features solid brass knobs and roses; rapid installation; automatic self-alignment; perfect fit for all doors from 1½ to 1¾ inches thick; a ½ inch thick brass face-plate; heavy-duty steel and brass latch, all described in this four-page brochure. Interior and exterior lock sets; keyless exterior sets; vestibule sets and dummy sets are presented. Sets available in brass or chromium finishes. Technical Glass Co., Inc., Dept. AB, 2050 E. 48th St., Los Angeles 58, Calif.



486-WALL PANEL-this eight-page catalog contains complete descriptive information, illustrations, specifica-tions and detailed drawings on insulated metal wall panel. The factory-assembled product is said to offer superior thermal qualities, flexibility and attractive appearance besides stressing ease of erection. Typical construction details in clear line drawings enhance the catalog's value to general contractors and architects. The Steelcraft Manufacturing Co., Dept. AB, 9017 Blue Ash Road, Rossmovne, Ohio,





485—STEEL SCAFFOLD-

ING-tubes, angles and couplers are components for all types of even most complex installations of this product, described and illustrated in 12-page catalog. Units make up exterior, interior scatfolding, concrete formwork, including slab supports and wall bracing, shoring and demountable structures for temporary use. Booklet contains useful photographs of equipment, conventionalized drawings indicating typical uses, Shlagro Steel Products Corp., Dept. AB, 84 Washington St4 Somerville, Mass.



487,—UNIT HEATERS—

company line of suspended space heaters for use with any type of gas fuel is illustrated and described in this six-page bulletin. Complete data, with dimensions and capacities of both propeller-fan and blower-type units, are included. Available output capacities range from 70,000 to 178,000 Btu's per hour. Explanations show how Aey can be used in commercial and industrial applications. Dravo Corp., Dept. AB, 1203 Dravo Bldg., Pittsburgh 22, Pa.

FOR MORE INFORMATION USE COUPON, PAGE 202





MATICO Confetti!

HURRAHS—from America's value-wise buyers. They really go for gay, festive, colorful Confetti. It's high-style flooring at low asphalt tile prices...easy to clean...lasts for years!

APPLAUSE—from leading decorators. They welcome the fresh, new styling that gives them wide freedom in creating exciting decorative schemes.

chemes.

A ROUSING HAND—from builders everywhere. Confetti is a brand new aid to home sales. Builders can now "trade up" their homes, "trade down" their budgets . . . save on installation costs. And Confetti is ideal for on-grade, slab construction homes. Fortified with polystyrene plastic for bright, enduring colors . . . extra toughness and resiliency.

Confetti is available in 10 high-spirited colors, in $9'' \times 9''$ tiles of 1/8'' thickness. Write department 5-3 today for full details and specification data.

MASTIC TILE CORPORATION OF AMERICA

Manufacturers of: Aristoflex • Confetti • Parquetry • Asphalt Tile • Cork Tile • Plastic Wall Tile

Joliet, Ill. • Long Beach, Calif. • Newburgh, N. Y.

New Coleman gas wall sell low-cost

No special construction-

They fit any home, new or old—

flat top, standard roof,

one- or two-story residences;

basement or slab-floor construction

The biggest selling, best advertised, and by far the most popular wall heater available. Because it fits smoothly between standard 2" x 4" centered studs, it is ideal for installation in new homes as well as existing construction that is to be modernized.

Requires no basement, special excavation or duct work. Beautifully styled and a real space-saver in small homes, upstairs rooms, basements, tourist cabins, etc. Also available in Dual Wall Models to heat two separated areas at the same time. Install them singly to heat a few rooms or use multiple installations for zone-heating larger residences. Write us and we'll have our nearest distributor work out cost to your specifications. The Coleman Company, Inc., Wichita 1, Kansas.

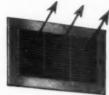
heaters cut your costshomes faster

fast, easy installation

NEW SHORT ECONOMIZER

puts more heat into room

Fits in wall above the heater. Reclaims heat from flue area and returns it to the room. Short enough to fit flat roof. goes in buildings with attic or upper stories.



NEW

DIRECTIONAIR BLOWER completely automatic with new Fan and Limit Control

Delivers tempered warmth clear to the floor. Increases circulation, prevents cold-floor discomfort. New Fan and Limit Control automatically regulates operation of burner and blower and economizes on fuel.



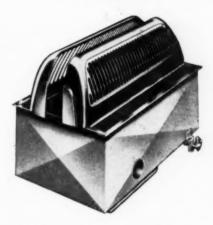
Comfort costs so little with a



NEW LOW PRICES COLEMAN FLOOR FURNACES

OIL GAS LP-GAS

Flat Register and Dual Wall Models to fit low-cost *specifications*



Complete in-floor furnaces that need no basement, no air ducts. Like Coleman Wall Heaters, they can be used singly or in multiple installation for zone heating. The famous Coleman Shalloflow is the industry's shallowest gas model.

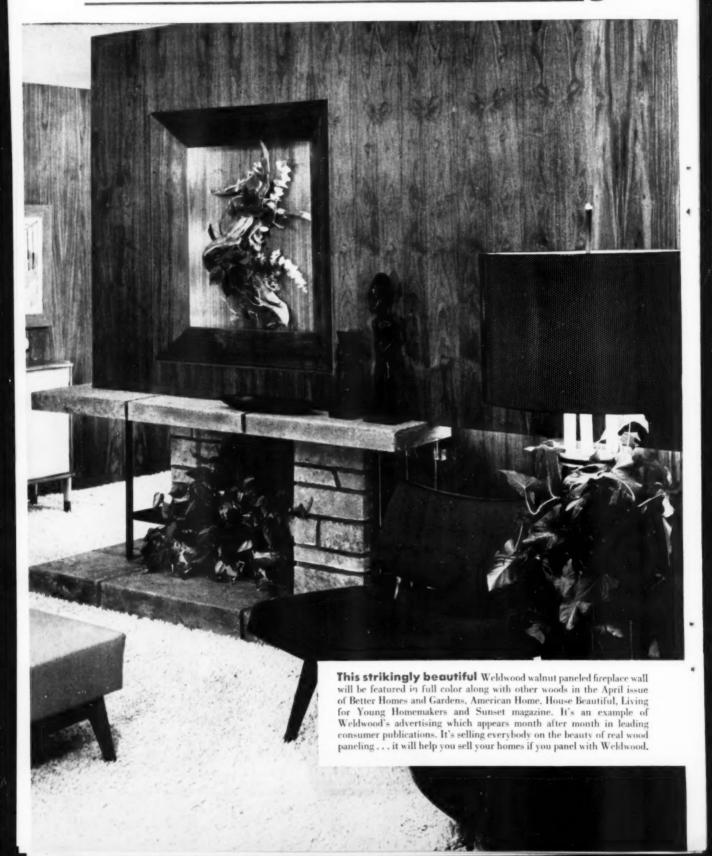
THE COLEMAN COMPANY, INC. Dept. 500-AB, Wichita 1, Kansa

Please have a Coleman distributor give me full information on Coleman Wall Heaters and Floor Furnaces.

Name	
Firm	
Street	

Equipment AGA approved or listed with Underwriters' Laboratories

You'll be closer to a closing if



you panel a wall with Weldwood

Do <u>one</u> wall in Weldwood paneling and all the other walls will look better. A Weldwood paneled wall perks up a room—adds the punch that helps to sell!

The idea of doing at least one wall in Weldwood paneling is really catching on with builders everywhere. At the recent Builder's Convention in Chicago we were told time after time about the big trend to wood paneling for interior finishing.

It makes plenty of sense, too, because after all what other material can match the warmth and beauty of real wood? Women prospects love it. Men respect its quality. Weldwood paneled interiors really help to sell a home!

MAKE THIS TEST! If you have shied away from wood paneling because you think it costs too much then make this simple test. Take any 8' x 12' wall area in

the homes you are building. Figure out just what it is costing you to install this wall with materials other than Weldwood paneling. Now compare this cost with that of beautiful Weldwood paneling.

IT'S INEXPENSIVE! For instance, you can do the same wall in luxurious Korina® for about \$53 for materials, in cheerful knotty pine for about \$38, in traditional oak at about \$53, in popular Weldtex® at about \$25, in rustic Surfwood® for about \$23 and in dramatic Novoply® at about \$25. Then there's Plankweld® in a variety of wood faces which saves you even more because it is prefinished—requires no on-the-job finishing.

We think you'll find remarkably little difference in cost, if any. Yet, there will be a whale of a difference in sales appeal when the house is ready to be sold.

For further information see your local lumber dealer now or contact any of the 60 United States Plywood or U.S.-Mengel Plywoods distributing units in principal cities, or mail coupon.

FOLLOW THESE SUGGESTIONS—THEY'LL HELP YOU CLOSE SALES!



IN YOUR HOMES—Check your blueprints and see where Weldwood paneling can most effectively be used. (For homes under construction Weldwood paneling can be included for less than you think.) Visit your local lumber dealer or Weldwood showroom and see the paneling.



IN YOUR PROMOTION—Weldwood products are constantly being advertised in other leading national magazines. Your building site display boards and promotional literature should place strong emphasis on the fact that your homes feature beautiful Weldwood paneling.



Weldwood plywood for interior use is guaranteed for the life of any house in which it is installed.

IN YOUR ADVERTISING—The Weldwood guarantee has tremendous sales appeal! Use it in your newspaper advertising and promotional literature. You can even include in your sales contract because the guarantee is backed by the largest plywood organization in the world.



Weldwood

United States Plywood Corporation

World's Largest Plywood Organization

55 West 44th Street, New York 36, N. Y.

U.S.-Mengel Plywoods, Inc., Louisville, Ky.
Distributing Agents in 60 Principal Cities

United States Plywood Corporation

AB

55 West 44th Street, New York 36, N. Y.

FREE: Please send me new Weldwood Catalog packed full of Weldwood data and specifications. ()

full of Weldwood data and specifications. ()

ADDRESS

CITY.....STATE.....



plants are important in cooling a house

Plants have a great capacity for preventing the passage of solar heat to surfaces on the opposite side. The main reason for this is that most of this solar energy is used in photo-

Structure designed to carry deciduous vines as summer protection against solar radiation or South oriented glass areas.

Designed by Robert B. Deering of the University of California's Department of Landscape Management

synthesis and in transpiration. Part of the heat is lost by conduction and convection to the cooler air and part by radiation. Some is reflected from the surface to the plant.

On the other hand, soils and construction materials absorb great quantities of heat, later radiating it back into the atmosphere. These materials need some sort of protection against the sun so that they will not receive this initial radiation.

In considering these basic facts, a recent conference on housing and building in hot-humid and hot-dry climates, sponsored by the Building Research Advisory Board of the National Research Council, came to these general conclusions:

(1) In areas where the warm winter sun is desired, deciduous trees should be used. Even when leaves are not present, thickness of branching and twigginess can screen out great quantities of radiation.

(2) The placement of trees and the use of grass near the house allows the heavier cool air to flow inside, provided low openings are present. High strip windows are not desirable in this respect.

(3) The greater the number and size of trees and square footage of lawn area, the more cooling there is.

(4) Shrubs may even increase the heat if the air circulation which aids transpiration is cut off. The use of very low ones is suggested.

(5) Windbreaks, however, may be necessary in order to keep out hot-dry and winter wind.

(6) Keep sun off walls to prevent heat absorption and reradiation, and off glass to prevent it from penetrating inside.

(7) Deciduous vines may be used on trellises over windows.

(8) Radiation may be partially stopped by the use of a wall cover of vines. This creates a cool air space between the foliage and wall.

(9) Roofs may even be covered in the same manner as walls, resulting in a double roof; the upper one of living materials.

(10) Keep lawns and trees well watered during dry weather.

(11) Shade as much paving as possible by trees and vines to prevent heat absorption. In hot climates it is well to keep paving to minimum.

NEW DUSTLESS FINISHING SANDER



You know what sanding drywall joints is like. You raise a cloud of fine, talcilike dust that settles on everything, it gots in your eyes — your nose — your threat. Unless you weer a mask, all you can small and toste hour after is powdered plaster.



Now this new Model 127 Finishing Sander gets the dust before it gets you like a miniature vacuum cleaner, it sucks up the dust raps it in a seeled bag. Keeps the room clean in the pic clear.

Clears the air...and the work...of aggravating dust!



Large size bag optional.

Porter-Cable DUSTLESS FINISHING SANDER Model 127

\$5950

On drywall joints, plaster, wood paneling cabinets, built-ins—wherever a smooth, scratch-free surface is essential—nothing quite matches Porter-Cable's new Dustless 127.

This orbital-action sander blends cross-grains without hatch marks. Sands straight grains satin smooth. Whisks away work-dust and abrasive-dust to help prevent scraping and scouring. And, because the abrasive stays cleaner longer, actually removes stock 25% faster.

Its vacuum system is so efficient (91% pickup on wood surfaces) that rooms adjacent to the work area can be painted without fear of flying dust. And on repair and remodeling jobs in the home you're spared an extensive clean-up job afterwards.

See your	Porter-Cable dealer
for details	and free demonstra-
tion. Or m.	ail coupon today.

Porter Cable
Quality Electric Tools

Manufacturors of SPEEDMATIC and GUILD Electric Tools

PORTER-CABLE Machine Ca. 2003 N. Seline St., Syracuse B, H. Y.	1	IN CANA Strangridge, 1		
Please send me complete information on Sander also name of nearest dealer.	the nev	Parter Cable	Dustless 12	7 Finishing
Address				

TRIPLE ECONOMY

It's the biggest truck news of '54

New Ford F-100 Pickup has big 45 cu.ft. payload capacity. Choose new 115-h.p. Cost Clipper Six or all-new







NEW LOW-FRICTION ENGINES offer • power increases up to 23% with gas-saving economy! One reason: modern Deep-Block, short-stroke design cuts internal friction up to 33%!

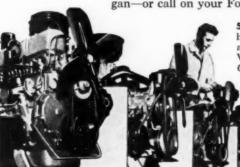
NEW 3-MAN DRIVERIZED CABS · cut fatigue. New long-wearing woven plastic seat upholstery. Exclusive Ford seat shock snubbers! Huge one-piece windshield!

BIG CAPACITIES! Ford's 221 new models offer low curb weights, top payloads! New Ford-built 6-Wheelers, up to 40,000 lbs. GVW! Two new Cab Forwards!

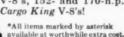
Ford advances further with big new savings in all 3 vital truck areas! There's more gas-saving power! Still better drivers' working facilities! Big capacities, too!

New Ford Trucks for '54 offer the mightiest concentration of power per cubic inch ever built into any truck engine line! And, smaller-displacement engines like Ford's five new truck powerplants normally need less gas! That's only one big factor behind Ford Truck Triple Economy for 1954. For more information, write: Ford Division, Ford Motor Co.,

Dept. T-23, Box 658, Dearborn, Michigan-or call on your Ford Dealer, today!



5 great truck engines: 115h.p. Cost Clipper Six, 130and 138-h.p. Power King V-8's, 152- and 170-h.p. Cargo King V-8's!





New Fordomatic Drive saves driver time and energy. Fully automaticno clutching, no shifting! Available in all Ford light-duty models for '54.*



New Vacuum Boosted Power Brakes now available on half-tonners make stopping up to 25% easier.* The foot pressure needed to stop truck won't break an ordinary light bulb.

Only Ford gives you Gas-Saving, Low-Friction, High-Compression, Overhead-Valve, Deep-Block engines in all truck models! Advancements like rotating valves increase valve life and full-flow oil filter lengthens engine life.

new products

STEEL FRAME FORMS

AR35406

A lightweight steel frame form for plywood panels features case of handling and quick field assembly. The width of the



steel frame is only 2½ inches, as compared with 4½, inches for wood frame forms. The manufacturer has developed a simple, easy-to-follow procedure that enables a contractor to build his own concrete forms in the field, using the frame and purchasing his plywood panels locally. Symons Clamp & Mfg. Co., Dept. AB, 4249 Diversey Ave., Chicago 39, Ill.

PLASTIC WALL TILE

AB35403

New plastic wall tile is 4½ inches square and conforms to the commercial standards of the S.P.I. An improved water-seal flange and a knife edge enter the cement without resistance and force the cement under the water-seal flange, assuring a positive waterproof installation, making this tile safe for shower areas and tub recesses, The economy of installation and the shallow cavity back are said to save several cents per square foot on mastic cost.

The contour face provides attractive wall surface with the bevel edge highlights and shadows. Design also practically eliminates clean-up after installation, as the knife edge prevents cement from coming out between the joints of the



tile. Inside and outside corners, feature strip and half tile, bull nose cap, with bull nose inside and outside corners, are made to accompany this new tile. Hachmeister-Inc., Dept. AB, P.O. Box 357, Pittsburgh 30. Pa.



MULTIPLE-USE AWNING WINDOWS

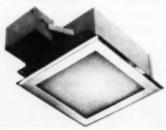
AB35401

Said to meet all demands of modern architecture, this new awning window emphasizes horizontal lines and great flexibility, making it ideal for the current trend toward more interior light and ventilation. The laboratory tested unit combines hardware that is especially designed but simple in construction with weathertightness, Called "Bilt-Well" awning windows, they may be grouped together or used singly as swing-out awning windows, swing-in hopper units, or stood on end as a casement unit, Builders will

RECESSED CEILING LIGHT AB:

AB35414

This new recessed lighting unit bears the trade name of "Ecco." It is provided with a built-in junction box, a specular re-



flector for maximum light output, lens of Corning Alba-lite glass and a chrome finish frame hinged for easy relamping. Designed to be installed with the manufacturer's bar hangers (an accessory), the fixture can be installed in 30 seconds.

Because of its economical features, the unit is recommended as a built-in fixture for tract homes selling for as low as \$6.000. According to the manufacturer, the salability of the house is increased at ne additional cost to the builder with the addition of an "extra that costs no extra." Marvin Manufacturing Co., Dept. AB, 3071 E. 12th St., Los Angeles 23, Calif.

discover their flexibility in using them in ribbons, stacked, or in combination with fixed or picture window units.

The windows are stated to be simple to install and furnished with all hardware. They are available with either a bar operator or a locking handle for easy opening or closing. All cleaning may be done from the inside exclusively. Units are made from kiln-dried Ponderosa pine which has been water-repellent preservative treated. Carr. Adams & Collier Co., Dept. AB. Dubuque, Iowa.

PORTABLE SAW

AB35404

The "Power-Guide" portable saw weighs only 11 pounds, and will miter a twoinch plank at 45 degrees; it has a shoe adjustment for slotting from ¼ inch up to 2 7/16 inches deep.

The saw is equipped with an air-cooled motor in an aluminum housing that delivers one full horsepower under peak load, using a standard 7-inch blade. The gear-box is sealed in grease and has a



one-year factory guarantee. With special blades, the unit will cut steel, tile, brick, concrete or corrugated metal. Motor is at left of blade, insuring good balance, safe control. Ram Tool Corp., Dept. AB. 411 N. Claremont Ave., Chicago 12, Ill.

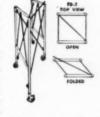


BUILDING BUY-WORDS Herb Willson

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An Advertising Page.

NOW, using the Safway-designed FD-1 folding device, work towers can clear narrow openings and be reopened into working position on the other side. The FD-1, attached to standard Safway scaffold frames, makes it possible to move a 4 or 5-foot wide scaffold through 30-inch doors without time consuming disassembly and re-erection. To fold the work tower, simply detach one end of the diagonal brace; to put the tower into



working position, re-attach the brace. You can get the full story on the money-saving FD-1 folding device by writing to Safway Steel Products, Inc., 6246 W. State Street, Milwaukee 13, Wisconsin.

SHAKERTOWN SIDEWALLS... and new Shakertown GLUMAC Units help you finish more homes easier, faster at surprising new lost cost. A Shakertown Sidewall is not only factory grooved and stained . . . it is "double-coursed" too:

NEW HOMES SELL FASTER

with colorful, distinctive



Thick-butted cedar shakes lend deep, soft shadow lines. They add eye-and-buy appeal, too, with decorator-selected colors, added insulation and real home economy. Here's a wood wall that won't blister or peel . . . can be applied in any climate, in any weather. See the Yellow Pages, or Write the Perma Products Co., Cleveland 27, Ohio.

ROOM

GROWING FAMILIES need increased space. Add a room! The Richkraft Co. has products that make that new room easier to install, better to look at and cooler. Richflex, that highly efficient reflective insulation, is easy to apply in sidewalls and ceiling and it cuts heat losses and acts as an effective moisture barrier. In ceilings

it can reduce inside temperatures as much as 15° and it has no superior as a guard against heat flow. Also, remember Richbead the metal wall corner when putting in your walls. It protects both interior and exterior corners from damage by toys and cleaning equipment. The Richkraft Company, Room 928, 510 N. Dearborn St., Chicago 10, Ill., can help



ELKAY'S STAINLESS STEEL LUS-TERTONE SINKS add the loveliness that attracts the women's eyes . . . the permanence that attracts the men's pocketbooks. Once a Lustertone sink has been installed in a kitchen, it never has to be replaced . . . Elkay

guarantees it to outlast the home! This fact, plus the sparkling easy to clean luster of genuine stainless steel, can be a mighty good sales point for your prospects. There is a model and size for every kitchen and don't let price worry you. ELKAY LUSTERTONE Stainless Steel sinks generally cost no more than colored porcelain sinks. Ask about LUS-TERTONE and the marvelous new ELKAY DURATONE sink and counter tops of beauty bonded Formica on steel. Write Elkay Mfg. Co., 1854 S. 54th Ave., Chicago 50.

I VISITED THE IN-SINK-ERATOR

booth during the NAHB convention and was I pleasantly surprised. There before me was a complete electric sink from food waste disposer to dishwasher. This sink will be a boon to builders as there, in one unit, is a home seller that will work like magic. The prospective housewife will see her kitchen chores practically melt away. And, the IN-SINK-ERATOR sink,



dishwasher and disposer combination will give you a nationally advertised home selling feature that's been presold for you. Get the facts from In-Sink-Erator, Racine, Wicsonsin.

KITCHEN DESIGNS FOR ONLY

\$5? Yes, it's a new service for builders and lumber dealers being offered by Mutschler...specialists in hardwood kitchens. You send rough floor plan with overall dimensions to be used, preference of



natural or enamel cabinets, color and style desired . . . Modern, Early American or other. Mutschler then advises cost for detailed floor plan and artist's sketch of kitchen as it will appear when completed. (Cost, based on number of appliance and cabinet units used, may be as low as \$5.) Your "okay" starts a kitchen design like those featured editorially in leading women's magazines . . . a design that sells the kitchen, sells the home! For free quotations, mail rough plan and information to KITCHEN DESIGN SERVICE, Mutschler Brothers Co., Nappanee 4, Ind.

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HERE'S ECONOMICAL QUALITY that helps sell homes. Cermak's threestyle line of plastic wall tile is a sure bet for added quality that turns prospects into buyers. Budget Bevel, Cleveland Pevel Edge or the distinctive Carra-Plas answer every demand for Price, Style and Quality. As a lasting wall covering in kitchen, bath and utility rooms they give every home colorful sales appeal. Exclusive "Undergate" moulding makes Cermak tiles the strongest. What's more, only virgin

polystyrene is used. Be sure to ask your Cermak dealer for Armstrong's 1402 cement. Years of experience prove it best. See your local dealer or write Cermak Tile Company Inc., 4901 Brookpark Rd., Cleveland 29. Ohio.

BUILD	ING BUY-WORDS
	ornelia Avenue o 41, Illinois
Please	send information on products checked:
☐ THE ☐ IN-S ☐ CER ☐ PER ☐ ELK	WAY STEEL PRODUCTS, INC.—FD-1 folding device RICHKRAFT CO.—Insulation and metal wall corner SINK-ERATOR MFG. CO.—Complete electric sink MAK TILE CO., INC.—Plastic wall tile MA PRODUCTS CO.—Shakertown sidewalls AY MFG. CO.—Stainless steel Lustertone sinks ISCHLER BROS. CO.—Kitchen design service (Include rough plan)
Name	
Addros	

fastening costs cut 30%



DRIVE-IT 320 WITH BREAK-OPEN ACTION

This Alaskan builder uses the new DRIVE-IT 320 with Break-Open Action to fasten 2x6 base plates to concrete block. The powder-operated tool "is more economical by at least 30%; results in material and money savings".

Almost all concrete or steel anchorages can be made with more savings and greater strength with DRIVE-IT.



NEW DRIVE-IT 320 FEATURES BREAK-OPEN ACTION FOR FAST, EASY LOADING AND EXTRACTION. OTHER JOB-PROVED DRIVE-IT FEATURES ARE:

ONE POWER LOAD. Variable penetration with one strength power load.

AUTOMATIC EXTENSION BARREL. Integral with tool. Extends to fasten in recesses.

SWIVEL SAFETY PAD. Swivels 360° to fasten near adjoining surface. Steel and tough Neoprene for protection.

SAFE TWO-HAND FIRING. Tool must be held against work to operate. Two-motion firing action for safety.

LOW COST DRIVEPINS. Prices are lower on wide range of drivepins.

FOR MORE INFORMATION



MAIL THIS COUPON

7526 S. W. Macridam Ave., Dept. D Portland 1, Oregon

Please send literature on DRIVE-IT "320"

Please send literature on DRIVE-IT "320"

I'd like a demonstration of DRIVE-IT "320"

Name__

Address State State

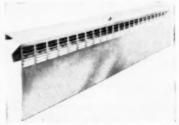
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new products

BASEBOARD ENCLOSURES

AB35421

New style KS enclosures are designed to provide a baseboard-type enclosure for commercial and industrial installations. The front and top are a one-piece unit, and the whole enclosure is mounted on a full metal backing, similar to the manufacturer's residential-type unit. Outline

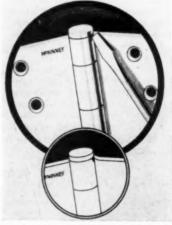


louvers are in the front skirt, so that convection currents are directed away from wall to improve distribution.

Made of 18-gauge steel, either Galvanite or prime-coated, style KS enclosures can be furnished in lengths of three-inch increments up to a maximum of eight feet in one piece. A full line of accessories is available, including joining and corner pieces and end enclosures. Radiator elements are hung from the backing by patented rod-type hangers. Vulcan Radiator Co., Dept. AB, 16 Francis Ave., Hartford, Conn.

REDESIGNED BUTT HINGE AB35407

A new feature of the manufacturer's butt hinge is a special "E-Z Out Notch" for easy removal of the pin. The annoyance of trying to remove pins, especially those with button tips, is overcome by the



simple device of having a specially designed notch on the pin knuckle at the upper left corner of the right leaf. A screw driver will push the pin up without marring or damaging the edges or face of the butt hinge. When the butt hinge is set, the notch is practically invisible. McKinney Manufacturing Co., Dept. AB, 1939 McKinney St., Pittsburgh 12, Pa.

FOR MORE INFORMATION
USE COUPON, PAGE 202

DRIVE-IT

the original

POWDER-ACTUATED TOOL



New Home Prospects

...came to inspect this attractive model home



erected by noted builder, C. Di Felice * (average price \$22,500)



A feature attraction, Was year 'round air





A new low price - makes "Command-Aire" conditioning a practical feature in moderately

Unusually compact design— permits the "Twins" to be installed in a closet or alcove . .

saves up to 100 dollars in space

Independent heating and cooling

units - assure proper delivery of air for both heating and cooling . provide better dehumidifi-

overload on furnace blower. Cooling initially—or later— The "Command-Aire" furnace member can be installed first, and the cooling "Twin" offered

later . . . whichever is most convenient for the buyer.

A unique Bryant warranty eliminates service headaches.

climinate

priced homes.

costs per home.

cation control . .

Result: 5000 50 sales in 90 days...a profitable

transaction for which Mr. Di Felice gives due credit to the

strong sales appeal inherent in the "Command-Aire" equipped

home. Specifically, Mr. Di Felice . . . and home buyers . . . liked

these unique features of the Bryant "Command-Aire" system . .



#Mr. Di Felice's homes, offered in 3 and 5-bedroom styles, are located

at Bob White Farm, a 200-acre tract of scenic land in Montgomery County near King of Prussia, Pa.

HEATING . AIR CONDITIONING . WATER HEATING

For full information write BRYANT HEATER DIVISION, 17825 St. Clair Ave., Cleveland 10, Ohio

MARCH 1954



Home buyers are sold – when they see a carefree EVAMA

Not only in kitchens, but in dining nooks, bathrooms and utility rooms—NEVAMAR adds a new protective beauty that's designed for a lifetime of faithful service. In attractive colors and patterns, including natural wood grains, it gives you endless opportunities for creating carefree rooms in many exciting decorative schemes. NEVAMAR is a pre-finished surfacing material—a high-pressure laminate that's easy to apply on both vertical and horizontal surfaces. Write for complete information and samples.

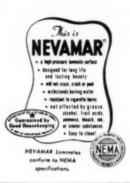
DISTRIBUTOR: THE NEVAMAR COMPANY, BALTIMORE-30, MARYLAND



Manufacturers of Nevamar High Pressure Laminates - SARAN FILAMENTS - Wynene Molded Products

ODENTON, MARYLAND . NEW YORK: EMPIRE STATE BUILDING . LOS ANGELES: 5075 HAMPTON STREET

In Canada: Richmond Plastics, Limited . Richmond, P. O.



GLASH LIGHTING COSTS



EHEM-O-GLAS/Facts

IT MAY PAY YOU WELL to get full details on economics now possible through use of these shatterproof, translucent, chemical-glass sheets.

translucent, chemical-glass sheets.
Only one of its type L.A. Code Approved as "Flame resistant." Colorful.
Colorfast. Fadeproof. Maintenancefree. No paint needed—ever. Precision-molded under 400,900 lbs. to
give greater strength of 26,000 psi,
and absolute uniformity throughout.
S colors in flat, or exclusive RIBBED
shape so easy to install without costly
special moldings. Small %" ito overlap saves up to 5c per sq. ft. Get facts!

"Tomorrow's Product"—available today. For complete facts, prices, free "Idea Folder" or name of nearest dealer, tear out coupon, now. Mail when convenient,

LAT CHEM-O-GLAS ENDS BREAKAGE

Use as replacement for standard glass.

NEWEST USE: To replace glass in Jalousie or Louver Windows. "Lets light in; keeps sight out." 5 colors.

CHEMOLD COMPANY, Dept. AB-3 2000 Colorado Ave.

RUSH ME: Chem-O-Glas "Idea Folder." Name of nearest dealer.
Dealer franchise data.

Name. Company. Address ...

SEND NOW

Santa Monica, Calif.

FARM & HOME FREEZER SECTION lational Electrical Manufacturers Association 135 East 44th Street, New York 17, N. Y.

State

Suggestion for BUILDERS

You find, when selling a house, that its special features help you make the sale. You know, too, that a lot of sales are closed in the kitchen—because that room is the focal point of interest for the homemaker.

A few years ago, the progressive builder could sell his houses if the kitchen had space for an electric range and electric refrigerator. Then he found that his kitchens must accommodate several more electric appliances. In fact, it usually was difficult to make the sale without them.

Now there's one more appliance that customers demand—a modern home freezer. The reason? They want to be modern-live electrically!

More and more home buyers every year want this appliance that saves them time, money and labor, allows them to serve better meals, at lower cost. Last year, more than 1,000,000 freezers were installed in American homes.

That's why you should design your kitchens with space for a freezer—allowing, too, for the weight of this appliance and its contents, in figuring the load-bearing strength of

Don't miss out on this important selling feature. If you need more information, write to any of the manufacturers listed below—or see their dealers in your community.

ADMIRAL - BENDIX - COOLERATOR - CROSLEY - DEEPFREEZE FRIGIDAIRE - GENERAL ELECTRIC - GIBSON - HOTPOINT INTERNATIONAL HARVESTER - KELVINATOR - NORGE - PHILCO QUICFREZ - REVCO - SEEGER - WESTINGHOUSE

new products

METAL WEATHERSTRIP

AB35417

"Seal-Draft," a new development in weatherstripping steel and aluminum casement windows, is said to seal out drafts and dirt from infiltrating around window openings. It is made of a weather-and corrosion-resistant alloy of chromium, magnesium and aluminum which permits contact with a steel without electrolitic decomposition of the product.

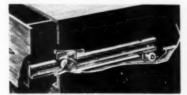


The alloy strip is easy to install: it slides onto the window frame. Corner pieces hold it securely in place. The wide scaling flange enables the stripping to conform to such window deformities as the ventilator's not closing tightly against the frame around the perimeter of the opening. This makes possible a tight seal, instead of providing only occasional contact. Because of the thin-gauge metal, the stripping fits into window manufacturers tolerances for ventilator clearance and does not bind the window. It allows full freedom of opening and closing. and does not interfere with storm window or screen placement. Steel Sash Service, Inc., Dept. AB, 2141 Lawrence Ave., Chicago 25, Ill.

DRAWER SLIDE

AB35422

A lightweight, nylon ball-bearing extension drawer slide is available in 14-, 16-, 18-, 20-, 22- and 24-inch lengths. Although



the unit is a low-cost and lightweight unit, it will easily carry loads of well over 100 pounds, according to its manufacturer. Knape and Vogt Manufacturing Co., 658 Richmond St., N.W., Grand Rapids 4, Mich.

FOR MORE INFORMATION
USE COUPON, PAGE 202



Pour faster with a Jaeger

Look how this mixer puts out stiff concrete as fast as you can take it. You charge in only 5 to 7 seconds with Jaeger's "Skip Shaker" loader. You mix and remix more thoroughly with Jaeger's criss-cross action, then discharge in another 5 to 7 seconds with Jaeger's big bucket and flight blades and special "catch all" spoon.

With that speed you can really turn out yardage with a mixer that's as rugged as it is fast. Your Jaeger has a bigger engine, automotive transmission, Timken bearing drum rollers and heavy duty drum with machined steel tracks—all to give you years of service with low up-keep and without costly breakdowns on your jobs.

Available in 31/2, 6, 11, and 165 sizes. Ask for Catalog M-10.

THE JAEGER MACHINE COMPANY 521 Dublin Avenue

PUMPS . COMPRESSORS . HOISTS . TRUCK MIXERS . PAVING MACHINES



add to prospectivebuyer evaluation

- Heavy-quality metals and glass, precision-engineered.
- Easy-gliding overhead track or piano-type hinges.
- Leak-proof mastics and special arips — designed to prevent leakage.

207 NORTH MAIN . HOUSTON, TEXAS

Gulfspray shower doors and tub enclosures help prove that IF YOU PUT MORE OF THE BETTER THINGS INTO A HOUSE you'll get more for it. Easy installation and maintenance and beautiful design make Gulfspray enclosures favorites with builders—and home buyers everywhere!





PER-FIT SLIDER

gives you all these features!

Mr. Builder: PRICE? You will be astounded at the low cost of this window when your dealer quotes you.

Acclaimed by everyone as the window they have been waiting for. Its new advanced design results in amazing quality at surprising low cost. Study each of these important features. You too will say "This is the window *l've* been waiting for".



Continuous perimeter fins permit the cheapest, most inexperienced help to in-



No more dirt or bug trench for you of the owner. The sash track is protected with a removable ring cover plate.



Screw lack mitted sash corners permit easy re-glazing. ANYBODY can re-glazing a PER FIT slider sash – in minutes.



Sterm such and screen hardware are furtory located the actual recess is designed into the frame - no difficult job condition decisions to make.



sterior trine is part of the worder no pecial would back needed. When the PER FIT slider is in - you re done!



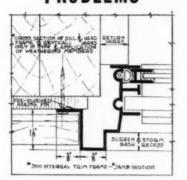
No dut, wind air ar water leakage -

Screw-lock smooth, mitred frame corners factory sealed. Rack-free rigidity. Close fitted joints-wind, water and dust tight forever. Factory located hardware assures perfect fit of starm sush and screens.

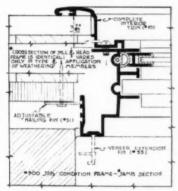
All frames have continuous perimeter installation fins. Semi-pneumatic Ventiseal weather stripping inside jambs. The most advanced weathering system, plus a sash cushion. Continuous zinc weathering strip in frame head; smooth operation and full length weather seal. Rubbing block on zinc weather strip in head assures perfect closure and seal of meeting rails. Scientifically designed weep holes in sill frame for immediate drainage under all conditions. Weep holes in sill frame protected from weather by continuous beaded flange which is an integral part of the removable cover plate.

All weathering is built into the window frame where it belongs; out of harm's way and thoroughly protected by the frame. Screw-lock mitred sash corners permit easy job re-glazing. Lifetime Ventiseal glazing. Sash siderails have two-point contact with semi-pneumatic jamb weather strip for double weather protection. Nylon pressure butons in sash head rail, actuated by stainless steel springs, eliminate wind rattles in any sash position; constantly push sash firmly against the zinc weather strip. Nylon-aluminum, aluminum-zinc contact provides natural lubrication for permanent, easy, fingertip operation. Pull-length self-sealing action provided between sash and sill cover-plate. Perged and machined cam action lock forces sash against the semi-pneumatic weather seal in side jumbs; seals meeting-rails air-tight, dust-tight; maximum weather seal. Top to bottom finger rail for quick, easy opening; prevents pinched fingers; adds beauty— and rigidity—at a critical point Na sharp, casily damaged weather strip exposed when such is out; no home-owner injury hazard.

NEW SLIDER SOLVES new products ALL INSTALLATION **PROBLEMS**



11/a" deep by 1/2" wide exterior trim (casing) and " wide pre-punched full perimeter nailing fin is integral part of window frame. Installed over sheathing in framed rough opening in less than five minutes. Almost impossible to rack. Easily mulled, May be used for masonry black construction; however, Job Condition Frame recommended.



100% versatile. Exterior trim (casing) is integral with window frame; contains continuous perimeter dove-tails to accept simple installation fins (#51, #52 or #53) wood frame or masonry construction. Simple vertical mulls. Jambs pre-drilled for positive screwing to rabbeted wood bucks. #51 Nailing Fin (pre-punched) provides six adjustments; one of three side dovetails chosen; offset in fin leg reversible before sliding fin into dovetail. #52 Massanry Block Fin (not shown) centers window frame in block slots. #53 Veneer Extension Fin provides wide brick mould when greater than 1" finger space required. #10 Interior Compilet Tail provides six adjustments; one of three side dovetails finger space required. #10 Interior Complete Trim wood frame construction in conjunction with used in wood frame construction in conjunction with 251 Noting Fin; a complete package fitting any through-wall thickness from 43%" to 53%" regardless of thickness of a exterior sheathing and thickness of interior wall materials. Infinite adjustment. 220 In-terior Cove Trim (not shown) used when frame is installed in black construction with #52 Masonry Black Fin and interior masonry left exposed; #20 Trim also applicable for other types of wall construction.

PER-FIT DOUBLE HUNG . BEST-VENT DOUBLE HUNG . PER-FIT SLIDER . PER-FIT GLASS BLOCK VENTILATOR



PER-FIT PRODUCTS CORP

1204 EAST 52nd STREET . INDIANAPOLIS, INDIANA

RECESSED WALL HEATERS AR35419

Eight models of recessed, vented wall heaters are available in sizes of 15,000 through 60,000 Btu input, in single as well as dual units. The Model C-35 single is unusual because by removing a plate at the rear and adding a dual kit, it can be converted to a dual unit. This heater is useful to place between a hall



and dining room, hall or bathroom, or for regular placement, because it has the warm-air outlet only on one side; all the intake air is from the control side. which has both intake and outlet.

The Model C-60 can be bought as a gravity flow unit, or by adding the blower kit, it can be used with a blower for added circulation. Hammel Radiator Engineering Co., Dept. AB, 3348 Motor Ave., Los Angeles 34, Calif.

AB35411

CHAIN SAW

Faster cutting, light weight, high power and low maintenance are among the features claimed for this 30-pound, 51/2-h.p. gasoline powered chain saw. Its makers state that the tool will cut through a 20-inch tree in as little as 20 seconds, and will bring down four- or five-foot diameter timber quickly and easily.

Because of its light and balanced weight, the saw is said to be easy to



handle; it cuts in any position-up, down or upside down-on all types of cuts. for felling, bucking, boring, notching, trimming or undercutting. Blade sizes include straight blades in 18-, 23-, 30-, 34-, 42-, and 44-inch sizes, and plunge-cut bow saws for one- or two-man operation available in 14- and 18-inch sizes. Homelite Corp., Dept. AB, 111 Riverdale Ave., Port Chester, N. Y.

> FOR MORE INFORMATION USE COUPON, PAGE 202



There are two mighty good reasons why craftsmen everywhere prefer MALL saws. First—MALL offers a bigger selection of styles and sizes to give you the EXACT saw you want. And MALL saws are built better, designed better to give many years of dependable service. Here are three of the many MALL saws to choose from—

MODEL 70-714" blade. Cuta wood to a maximum depth of 214". Free blade apeed of 4800 r.p.m. Bevel cut adjustment al-lows cuts to 2" at 45°. Depth adjustment Depth adjustment for minimum cut of ½". Arbor hole size of ½". Arbor hole size of ½". Weigha 16 pounds. Equipment—combination blade, 15-foot cord, metal case, special tools, and lubricant. \$115.00. f.o.b. Chicago

MODEL 96-934" blade. Cuts to maximum depth of 334".

Free blade speed of 3800 r.p.m. Hevel cut adr.p.m. Hevel cut adjustment gives cuts to 2\% at 45°. Depth adjustment for minimum cut of 2\%. Arbor hole size of \(\frac{1}{2}\% \). Arbor hole size of \(\frac{1}{2}\% \). Weight 19 pounds. Equipment—combination blade, 15-foot cord, and lubricant. \\$1\$5.00, f.o.b. Chicago



OTHER MALL TOOLS FOR BUILDERS

In addition to manufacturing top quality electric and pneumatic aaws, MALL produces an outstand-ing line of drills, sanders, polishers, screwdrivers, planes, door lock mortisers, impact wrenches, flexi-ble shaft machines, and the world's finest line of chain saws.

40 Factory-Owned Service Warehouses, Coast to Coast,

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Send	me more	information ab	out MALL saw
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Now_get all your answers automatically!



WITH THE <u>NEW</u>, FULLY AUTOMATIC, REMINGTON RAND PRINTING CALCULATOR

This new, printing calculator automatically multiplies, divides, adds and subtracts amounts up to ten trillion. It proves and prints every calculation on the tape. It's the first fully automatic printing calculator with all these features:

Automatic multiplication

Automatic division

Automatic credit balances

Simpla-tape . . . printed proof in black and red.

10-Key touch addition and subtraction ... for faster operation.

Constant key . . . the exclusive multiplication "memory" feature.

Automatic Total Control...individual or accumulative totals.

Two-color ribbon . . . totals, subtotals and credit balances in red.

FREE! Ask your Remington Rand Representative for an eye-opening demonstration, or send for your copy of the "show how" folder illustrated here. Write Remington Rand, Room 1882, today. Ask for C669.



Remington Rand

PROFIT-BUILDING IDEAS FOR BUSINESS . 315 FOURTH AVENUE, NEW YORK 10, N. Y.

new products

GLASS DOOR WEATHERSTRIP AB35420

An improvement for the manufacturers' sliding glass doors uses mohair pile for the weather strip and guide in the glassrun channel of the top section of the door. The door now uses no top guide rollers, wheels or other moving parts. The mohair pile guide makes the door nearly noiseless in operation. The door



rolls on ball-bearing brass sheaves in the bottom rail on a stainless steel track.

A double weatherstrip with mohair pile touches both sides of the vertical flange in the head of the frame. With this double contact, the mohair pile seals out drafts, regardless of the wind load applied to the sliding panel. Areadia Metal Products, Dept. AB, 324 N. Second Ave., Areadia, Calif.

TACKER STAPLE

AB35410

A ¼-inch leg length staple has been added to the Arrow Model T-50 gun tacker staple sizes, 3₈. ½- and 9/16-inch. The new staple size has been made for tacking jobs which require a shorter leg length. Like the other three sizes, the ¼-inch staple is wedge pointed and made of .050-inch carbon steel wire.

The new staple's uses include upholstering; installing ceiling tile, insulation,



building paper, batt wool, foil, roofing felt and underdecking; for shingles and siding; and numerous other uses. Arrow Fastener Co., Inc., Dept. AB, 1 Junius St., Brooklyn 12, N. Y.

> FOR MORE INFORMATION USE COUPON, PAGE 202

> > AMERICAN BUILDER



This little pig goes to town for builders using Temlok sheathing

Starting in March, this little pig will help you sell houses by opening an imaginative advertising campaign. It is designed to create new interest in Temlok® Sheathing and help pre-sell prospective home buyers on its many advantages.

Home buyers recognize brand names in home building as a guarantee of the quality they expect in a well-built house. They know that houses built with the name brand products give them the most house for their building dollar. The brand name, "Armstrong's Temlok Sheathing," has been built by many years of constant advertising.

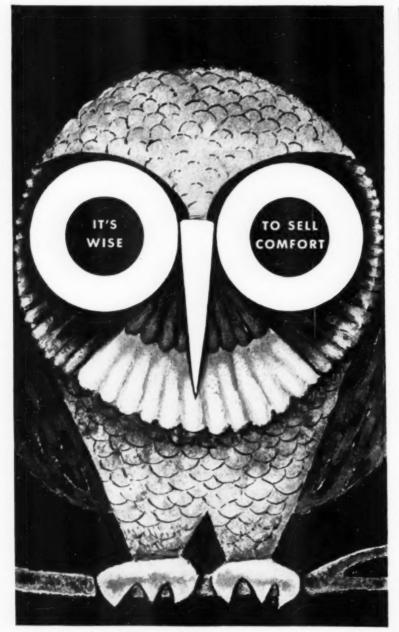
Now, a new series of Temlok ads featuring familiar figures of folklore will appear regularly in American Home and Bet-ter Homes and Gardens. This smart little porker demon-strates, in a refreshing new way, how to build a comfortable and draft-free house with Temlok Sheathing.

In today's competitive market, famous brand names work as effective salesmen to help you sell houses. You're adding a strong sales feature when you tell prospects that your

If you would like full-color reprints of ads from this series to display in your houses, write Armstrong Cork Company, 3703 Rider Avenue, Lancaster, Penna.

ARMSTRONG'S TEMLOK

The sheathing that helps you sell houses



show 'em Regulaire* the comfort feature only perfection can offer

Perfection can make the difference between a big "YES" and a "maybe" from prospects. These automatic gas or oil-fired furnaces with exclusive Regulaire make the heating system a real talking point with home buyers. Regulaire ends cold floors forever . . . stops cold blasts and sudden surges of hot air. Ask your heating contractor about it. Perfection Stove Company, 7519-B Platt Avenue, Cleveland 4, Ohio. *Pat. Pending



CENTRAL COOLING, TOO Perfection heating contractors and dealers are pledged to back you with service you can count on. Perfection











new products

TRIANGLE VENTILATOR

AB35418

The "Giant" triangle ventilators are designed to provide builders with a large-sized, assembled unit that gives adequate ventilation on low 5-12 pitch roofs. They are built in three widths: 90 inches opening width, 1834 inches high, providing 344 square inches free area; 69 inches



opening width, 19% inches high, provid-187 square inches free area; and 47 inches opening width, 9% inches high, with 84 square inches of free area.

Louvers are held to the side frame with tabs and cannot come apart or fall out. Louvers are designed to keep out snow and rain and have extra rigidity to prevent rattle. The wide frame of the ventilator seals around the opening. A screen is provided in back to keep out birds and insects. Air Control Products, Inc., Dept. AB, Coopersville, Mich.

FOOD WASTE DISPOSER AB35405

This unit features easy installation and quiet, fast operation. Waste material is ground away from the bottom, instead of the sides, so that material remains relatively stationary in the disposer. This type of cutting action eliminates much noise and is exceptionally fast, disposing of a pound of ordinary food waste in 30 seconds.

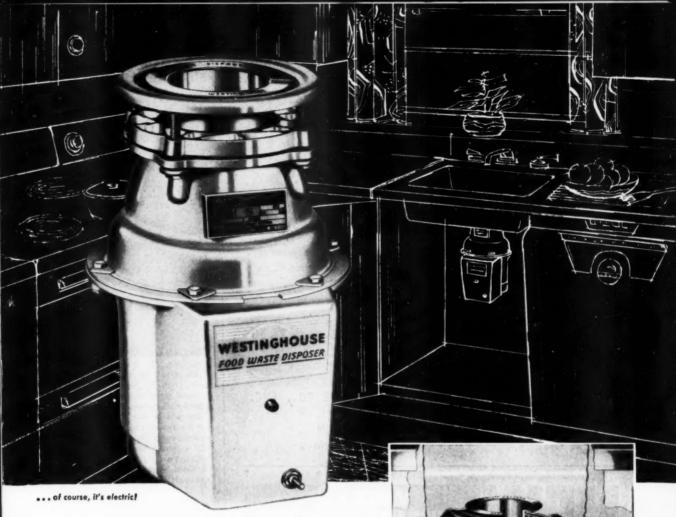
The disposal unit weighs 24½ pounds and features a special mounting ring which lets the disposer support its own weight before any bolted connections are made. The mounting ring also permits the disposer to be rotated a full 360 de-



grees for quick connection between the tail piece and existing trap. Absence of any metal-to-metal contact between the disposer unit and the sink, or between the disposer and the waste lines, prevents the transmission of any vibration, and cuts noise. Universal-Rundle Corp., Dept. AB, 157 River Road, New Castle, Pa.

FOR MORE INFORMATION
USE COUPON, PAGE 202

AMERICAN BUILDER



Low-cost sales clincher

Don't overlook the "buy appeal" of this new Westinghouse Disposer

Important house merchandising features should be considered in the planning stage. Here, for instance, is one that offers "buy appeal" far in excess of its modest cost. It's the plumbed-in appliance most new home buyers expect to find in their home. And why not? They want the freedom it offers from unsightly garbage cans and unpleasant kitchen tasks.

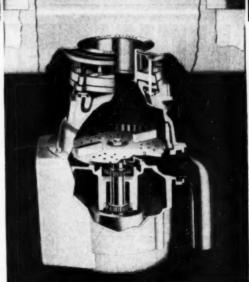
New in every way, this Westinghouse Food Waste Disposer shreds all kinds of food waste as fast as it can be loaded. The reversing switch doubles the unit's life by allowing use of both edges of the double-edged shredders. Operation is truly quiet with all metal-to-metal contacts cushioned by Neoprene "shock absorbers".

For complete details, see your Westinghouse Distributor or write direct.

WESTINGHOUSE ELECTRIC CORPORATION
Electric Appliance Division • Mansfield, Ohio

Makers of Refrigerators, Home Freezers, Ranges, Laundromats, Dryers, Dishwashers, Water Heaters, Vent Fans and Food Waste Disposers.

YOU CAN BE SURE ... IF IT'S Westinghouse



UNIFORM SHREDDING—Waste is reduced to fine particles that scour drain lines, keep them clean, and allow efficient reduction in septic tanks.



EASIER TO INSTALL— Easily installed by one man, this unit fits all standard sinks, requires no extra plumbing fittings, is 50% lighter in weight than previous models.



GET YOUR POWER TOOLS ON THE JOB-IN A HURRY!

TEMPORARY SERVICE MAST INSTALLS IN MINUTES

MITI-MAST lets you get ready for power the first fifteen minutes you're at the site. Complete unit includes heavy duty wire holders, entrance head and pre-wire utility box. Raises service wires to 12 ft. but telescopes to eight feet for hauling and storage.

> 36.50 freight paid

Slightly higher

UTILITY SERVICE CO., INC.

921 THIRTEENTH ST. RACINE, WISCONSIN

Write for complete line catalog

Exclusive Jesign. Has two 120V outlets, one 220V outlet. Fuses in box. Füdlack,

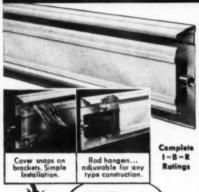
UTILITY

BOX



FIRST CHOICE FOR FASTER INSTALLATION
Save Time...Man Hours...Money...On Every Job

*Trade-mark Reg.



PRICE

TRIMLINE radiation costs less. New TRIMLINE features save time and money. Fewer joints necessary, less fittings. All parts mount on one piece top and back. Front cover snaps on after installation.

PERFORMANCE

TRIMLINE provides the two most used types of heat. Radiant for floor level comfort. Convection for warm air throughout "comfort zone". Continuous inlet and outlet slots assure more heat output.

ATTRACTIVENESS

Vulcan's NEW, TRIMLINE COVER is designed for enduring beauty...built to harmonize with any residential decor. The STREAMLINED top of cover reduces apparent depth. Front easily removed for cleaning.

Representatives in Principal Cities Write for New TRIMLINE Catalog No. 54

The VULCAN RADIATOR COMPANY

her Twenty-Eight Yours
A Loader in
Fin-Tube Radiation

ulcan COSTS LESS!



26 FRANCIS AVENUE

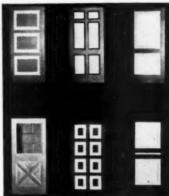
HARTFORD 6, CONNECTICUT

new products

PANEL ENTRANCE DOORS

AB35415

A series of new panel entrance doors, specifically designed for current architec-



tural trends, is available in eleven new styles to suit modern, contemporary and ranch style architecture. The designs are, in most instances, interchangeable to an extent with various types of architecture. Some will fit into ranch style and contemporary homes, others will go into contemporary or modern, and even colonial entrances can acquire a fresh grace with the new styling, say designers. M and M Wood Working Co., Dept. AB, 2310 N. Columbia Blvd., Portland, Ore.

RESIDENTIAL WINDOWS AB35413

Complete new window line called Fenestra Residential Projected Windows has been introduced. It includes ten types, and consists of projected-in and projected-out ventilator units and fixed lights for use in various combinations. The units solve the problem of weatherproof ventilation and offer new styling



that keeps pace with modern architectural progress, according to their manufacturers.

Weather protection offered includes the rain-shedding qualities of the projected-out ventilators and the draft-free ventilation provided by ventilators which tilt inwards. Proper inside screening and storm window protection are also available. The ten combinations of vented and fixed units, projecting in or out, may be combined to make up various window areas. Detroit Steel Products Co., Dept. AB, 3101 Griffin St., Detroit 11, Mich.

FOR MORE INFORMATION USE COUPON, PAGE 202



this picture demonstrates 3 ways heat escapes from a house

Johns-Manville Spintex Insulation prevents heat escaping all 3 ways

Tomorrow at breakfast, let your coffee and a lighted match show you how Johns-Manville Spintex insulation can keep heat from moving out of a home.

Only this type insulation properly applied prevents heat escaping all 3 ways.

· by conduction:

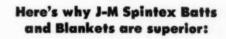
Notice how quickly the handle of your spoon warms up. Fast-moving molecules in the hot coffee kick into action the slowed down molecules of a cold silver spoon. In this same way, furnace heat kicks its way out through uninsulated or poorly insulated walls and ceilings.

• by convection:

When you light a match for your cigarette, notice that the flame is pulled straight up by rising heat. Heat behaves the same way in a house with uninsulated walls and moves to the colder surfaces where it finds ready exit to outdoors. Drafts result.

· by radiation:

Now sip your coffee. Notice it has cooled perceptibly in a short time. What happened to the heat? Most of it propelled itself out into the air, will continue to radiate in all directions unless it is stopped by efficient insulation.



- Made of the new long fibre Spun Rock Wool originally developed by Johns-Manville.
- This long fibre spun wool plus J-M "Know How" results in a better batt or blanket than ever before produced.
- Spintex will not settle—its long fibres are firmly felted for maximum resistance to normal building movement.
- Cuts clean; leaves clean sharp edges, for snug fit
 —will not fall apart.
- Easy to install. They hold their shape. Rigid yet resilient characteristics assure easier handling, quicker installation.
- 6. Backed by Johns-Manville's years of experience in developing insulations for home and industry.
 For full details about Spintex Insulation, write Johns-Manville, Box 60, New York 16, N. Y.



Johns-Manville

new products

FOLDING DOOR

AB35416

The new "Veni-flex" folding door is being discovered by builders as a money-saving item and as a sales tool. The cost of in-



stallation and servicing is stated to be low and the money saved by elimination of jambs and casings, as well as over door construction when used as a ceilingheight closet closure or room divider amounts to an impressive figure, the manufacturers say.

The door's features include savings in space, better ventilation, increased accessibility and convenience. Consolidated Venetian Blind Co., Dept. AB, 2101 Nicholson St., Houston 8, Texas.

FLOOR TILE

AB35408

Builders are reporting widespread, growing acceptance of Koroseal Floor Tile. This durable product is made of the same material from top to bottom. It is resistant to oil, fats, greases, acids and alkalies. It needs no waxing because the normal buffing action of walking feet develops a high luster. The tile is said to be especially suitable for installations where there is heavy foot traffic. It is available in ½-inch thickness for com-



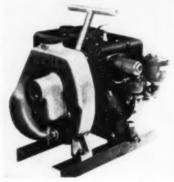
mercial use and 80-gauge for home installation, B. F. Goodrich Co., Flooring Div., Dept. AB, Watertown 72, Mass.

PORTABLE PUMP

AB35412

This new unit is stated to be useful for transfer of liquids, for fire fighting and for dewatering pits and flooded areas. The pump is completely self-priming, yet has no valves or moving parts other than the motor, pump impeller and seal. It delivers over 100 gallons per minute at lowest head, and is capable of forcing water to a maximum height of 100 feet. Impeller is open-faced, non-clogging type which will handle all solids passed by the suction strainer affixed to the end of the suction hose.

A 3/16-inch thick steel wear plate is rigidly fastened to the pump casing by two heavy carriage bolts terminated on the outside by sealed dome nuts. Both impeller and wear plate can be replaced quickly in case of wear or damage. Intake and discharge connections are tapped



for a 1½-inch pipe thread. Pump is powered by Briggs & Stratton 1½ h.p. engine, Kenco Pump Co., Dept. AB, 1125 N. Ridge Road, Lorain, Ohio.

AR35402

BUILT-IN ELECTRIC OVEN

A new built-in electric oven unit with a capacity of 4,905 cubic inches and a built-in surface unit is designed to minimize cooking effort. The front of both units is stainless steel with a satin finish. Oven controls are below the door; from left to right they consist of lighted pushbuttons for broiling, baking, timed baking and a rotary thermostat for desired oven temperatures. A separate time control provides for setting the oven for cooking at any time desired.

Companion piece to the oven is the surface section, available separately. This unit is flush with the counter top. Two 6-inch units of 1.250-watt capacity are set slightly forward, while two 8-inch units, 2.050-watt capacity, are set slightly be-



hind them. A separate indicator light adjacent to each surface unit lights up automatically, telling the user which unit is on. Surface section measures 34x20 inches. Hotpoint Co., Dept. AB, 5600 W. Taylor St., Chicago 44, Ill.

PORTABLE POWER SHOP AB35409

A jack-of-all-tools has been introduced that can handle special finish carpentry jobs. It obviates the necessity of taking a man off the job and sending him to the nearest lumber yard. This 5-in-1 power shop is an aid to builders who need an 8-inch tilt-arbor table saw on the job. combined with a vertical or horizontal drill press of unlimited capacity, a tilt-arbor disc sander, a wood-turning lathe.

A heavy steel box-girder provides a rigid base for the machine, and the whole



shop can be mounted on any improvised table or bench five feet long by 18 inches wide, Plana Centric Power Tools, Dept. AB, 20 Boylston St., Boston, Mass.

USE THIS COUPON FOR MORE INFORMATION ON NEW PRODUCTS AND CATALOGS IN THIS ISSUE Save Time—Just Insert Key Numbers and Mail To:

American Builder, 79 W. Monroe Street, Chicago 3, Illinois

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YOUR CUSTOMER SPEAKS:



Lights in Strand door op

The man who sold me my STRAND All-Steel garage door did me a big favor.

After several years, it still works smooth as silk, and satisfies me every day.

And now I know that if that door had cost twice as much, I would have bought it. But, oddly, it cost less than some doors, because, as my builder explained, STRAND doors are standardized and mass-produced and built for simple, inexpensive installation.

I've struggled with other kinds of garage doors in my time-wood doors that rotted and sagged, aluminum doors that dented easily, even inferior steel doors. I've learned that STRAND doors don't shrink, swell, warp, rot, sag or hang heavy.

Most of my previous doors I just left open most of the time-too much trouble to close. But my STRAND door is so easy to close and so handsome to look at, I always shut it. The modern horizontal-line styling makes my house look smart.

STRICTLY SALES ANGLES



Built Like a Bridge

Welded into a 1-piece masterpiece, with strong diagonal rear braces welded to the deep, sturdy steel frame. Truly, a "Lifetime Door."

STRAND doors are galvannealed with a thick, oven-baked coat of zinc armor. No prime coat needed for painting.



Up in a Hurry

The 1-piece construction, and factoryassembled hardware enable you to put STRAND doors up in a jiffymore profit for you.



For Today's Wide Cars

For only \$5.50 more (factory list) you can give your customer a 9'-wide STRAND door, and he'll thank you for the bigger target every time he drives in or out. (8' and 16'-double door-also available.)

Wide National Distribution

STRAND doors are easy to get through 150 national distributors and thousands of dealers.

This Book Will Help You

This 32-page book will make you a garage expert, and give you 12 designs and floor plans, how-to-build instructions, ma-terial lists, drivew? sketches, etc.



State



Strand Garage Door Division Detroit Steel Products Co.

Dept. AB-3, 2242 E. Grand Blvd. Detroit 11, Michigan

Please send 32-page booklet of Garage Plans and Ideas. I'm enclosing 10c for postage and handling

Please send free Strand literature and free Garage Plan of the Month

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Address

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QUALITY DRY WALL TOOLS

One source for everything you need!



THREE-IN-ONE DRY WALL FINISHING TOOL. A new, improved tool that's amazingly versatile! It has a single that it is a single that it is a single that it is a single and replaceable blodes . . . made of very flaxible, perfectly tempered spring steel. Each blade locks quickly, securely into the lightweight aluminum blode clamp by means of two small bross wing nuts. All blodes can be used in reverse travel position (see small photo).

No. TRIO—Complete with 3 Blodes.

\$5.95
No. DWSB—Bowed Shearing Blade Only,
11-in. x 4-in. with a 3/32-in. concave user.

1.1-in. x 4-in. win a 3/32-in. 60h-cove curve.

Ne. DW11-Flat Blade Only, 11-in. x 4-in. 1.50

Ne. DW8C-Blade Clamp Only. 2.75



ONE-MAN, DRY WALL TAPING MACHINE. Low cost, easy to operate. Spreads cement and tape evenly in one quick operation. Cement spreads outomatically to desired thickness. Learn to use in a few hours; tope many times faster. Lightweight alloy, weight only 4% labs. empty or 8 las. looded with 250° of tope. Loads easily in seconds. Excellent balonce, pencil-point precision. ORDER TOD, NET METERS (1998).





CURVED SLADE TROWEL. 12 x 4/2-in. Tempered Spring Steel Blade has a 3/32-in. concave bow—just the ticket for finishing dry wall seams—and perfect for those who prefer a "Trowell" type tool. The fine blade is permanently riveted to a lightweight aluminum shank. Handle shaped for comfort. No. DW34-Each

write today for details on other money-saving items in the Galdblatt complete line of Dry Wall tools and equipment. Just about everything you need for faster, easier and better work.

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Get yours now! A "must" buying guide for anyone in the construction trades. Describes more than 1,000 items—30 brand new items. Hundreds of illustrations. 100 rotogravure pages. Check box in coupon, test out end mail right new to Goldblatt Tool Company, 1912-D Walnut St., Kensas City, Mo.

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If your dealer cannot supply you, use coupon to order from this ad. We ship promptly. Add 5% to order for postage and packaging-minimum 25c.

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	Enclosed find my remittan in full for tools checked.	ice			ind \$1.00. Send tools O.D. for balance.
	TRIO, Complete with \$5.95 each	h 3 Blade	8,		DWC1 Taping Tool, \$4.95 each.
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MASTER WEATHERSTRIPS

For the

PROFESSIONAL BUILDER

There are no finer weatherstripping materials than those manufactured under the MASTER name.

- Thresholds
- · Rib Strips
- · Interlocking Strips
- Cushion Bronze
- · Cushion Aluminum
- Metal Casement Strips
- . Door Bottoms
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- · Caulking
- · Tools

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NO-DRAFT SASH BALANCE

MASTER METAL STRIP SERVICE, INC.

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ATTIC STAIRWAYS

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PROFITS

Chicago 39, Illinois

CONTRACTORS—BUILDERS **BUILD A BUSINESS** INSTALLING CRAIG

FOLD-A-STAIRS

MAKES THE WASTE SPACE OF THE ATTIC USABLE FOR STORAGE AND ADDED LIVING SPACE EVERY HOMEOWNER

A PROSPECT

GET OUR SALES PLAN WRITE TODAY

CRAIG WOOD-PRODUCTS

COLUMBUS. GEORGIA

DeLuz	кe	Maroon	Finis	h		
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E SI	MPL	EX			(6)	t. 6 in.)
_			IMPRO		-	ONLY
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For setting door jumbs and window frames! No other like it. 4 Plumbs, 2 LEVELS. Use either end or edge up. Weighs only 3 lbs. I-Beam type—stronger fhan aluminum. Direct from factory. Patented.

NO FACTORY REPAIRS NEEDED

Spirit tube holder (50¢) replaced in a minute with screwdriver. An ideal gift for any occasion. Send check or M.O. or C.O.D.

SIMPLEX LEVEL CO., INC.

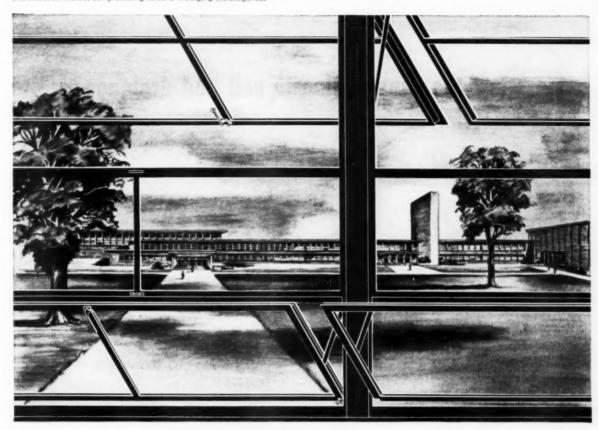
P.O. Box 329

Jackson, Michigan

CECO HAS ACHIEVED AN EXACTNESS IN INTERMEDIATE WINDOW DESIGN THAT MEETS THE NEED OF THE PRESENT... SETS THE PATTERN FOR THE FUTURE

It's easy to make a cheap product and it's easy to over-manufacture.

But it requires ingenuity and infinite skill to create the ideal of quality
and selection without compromising value or indulging extravagance.



Only CECO offers you 1½" and 1½" intermediate windows

For years Ceco engineers have been experimenting so as to give you the "just right" window.

Today we can announce mission accomplished in the two new Ceco creations ...

1% Intermediate Windows and 1% Intermediate Windows. For here are two windows that can be adapted to any building problem where

intermediate design is indicated. The 1½" window gives you weight and strength plus beauty at a sensible price. Hardware is handsome bronze lacquer finish.

The 1½" window assures greater strength and rigidity, adequate for any need,

longest trouble-free service, will outlast any structure.

New beauty is reflected in rich solid bronze hardware,

In these new windows Ceco has reached deeply into the future to bring you truly balanced design plus an innovation in simplicity... an exactness you can find nowhere else.



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Offices, warehouses and fabricating plants in principal cities General Offices: 5601 W. 26th St., Chicago 50, Illinois

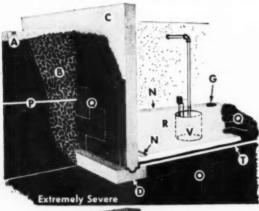
CECO PRE-PLANNING CONSULTATION SERVICE

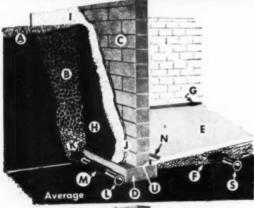
Ceco Product and Design Specialists will assist you in the application of Ceco building products at the pre-planning stage . . . Call your nearest Ceco office for overnight consultation service.

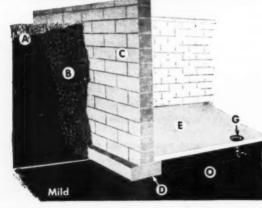
technical guide

for builders and craftsmen

key the construction to soil and drainage







If a house is to have a basement, it should be planned and constructed as carefully as the rest of the structure. The type of construction, waterproofing and drainage for watertight basements depend on conditions of soil and drainage. Three conditions are described below and recommended construction for each is given in the chart.

EXTREMELY SEVERE CONDITIONS exist where water pressure against the sidewalls or the floor of the basement cannot be relieved by the standard drainage methods of foot- or underfloor drains leading to natural drainage or storm sewer.

AVERAGE CONDITIONS exist where heavy soil normally holds water, but where the water pressure on the basement walls can be relieved by footing drains.

MILD CONDITIONS exist where water readily dis-(Continued on page 210)

KEY TO DRAWINGS

- A. Ground should slope away from house
- B. Backfill
- C. Foundation wall
- D. Concrete footing
- E. Concrete floor slab
- F. Porous drainbed or firm undisturbed soil
- G. Floor drain with trap
- H. Bituminous coating
- One-half inch mortar (not necessary on poured concrete foundations)
- J. Cove
- K. Coarse gravel or other porous fill
- L. Footing drain or field tile with open joints
- M. Building paper over joints
- N. Perimeter gutter sloping to floor drains
- O. Firm undisturbed soil
- P. Ground-water level
- Q. Membrane waterproofing
- R. Structural slab with reinforcing if necessary
- S. Underfloor drain laid in gravel
- T. Thin concrete slab
- U. Hot tar or asphalt poured in joint
- V. Sump pit with pump

WHO SAID AIR IS FREE?



Multiple accordion aluminum as it comes compactly from package contains very little air:

As installed creates five additional layers of "free" air.

INFR	A INSULATION, INC.
525 B	roadway, New York, N. Y., Dept. B3
□ Ple	ase send ASHVE booklet "Insulating Effect of Suc- sive Air Spaces Bounded by Bright Metallic Surfaces."
□ Ple	ase send description of new Infra Insulation.
☐ Ple	ase send samples.
Name	
Firm_	
Addre	255

INFRA INSULATION, INC., 525 BROADWAY, NEW YORK, N. Y.

Were it not for Radiation and Convection, empty air spaces inside walls, roofs, etc. would be the best insulation. But why pay costly labor and storage bills for handling "free" air entrapped **before** it is used in bulky insulation? Bulky materials also require more freight cars, trailers and trucks. The "free" air is paid for over and over again.

Multiple accordion aluminum envelops large volumes of air and creates layers of air spaces **only** as it is opened when finally stapled in place. This air is **really** free.

With respect to radiant heat flow, the aluminum sheets have 97% reflectivity, and 3% absorptivity and emissivity. Low conduction results from the preponderant air spaces of low density. The layers of multiple aluminum and fiber retard inner and outer convection. The tough aluminum sheets are impervious to vapor flow. Infiltration under flat stapled flanges is slight. Condensation formation on or within is minimized by the scientific construction of multiple layers of joist-to-joist, full-depth accordion aluminum, fiber, and air spaces.

MILLION SQ. FT. IN ROOM 12' x 13' x 13'

Because of the low mass of unopened, practically airless multiple accordion aluminum, an ordinary passenger automobile will hold 20,000 sq. ft. of it without being or even looking overloaded. A standard railroad freight car, a huge interstate trailer, or a number of trucks would be needed to transport an equivalent amount of ordinary insulation.

A *new multiple accordion aluminum, Infra, Types 6-Si, and 4-Si, gives **edge to edge** insulation between beams or studs, forming a "blanket" of uniform depth against heat and vapor flow, and condensation formation.

The AMERICAN SOCIETY OF HEATING VENTILATING ENGINEERS has published a booklet which describes convection, conduction, and radiation heat flow through *ordinary* air spaces and what happens when an ordinary building space is lined or subdivided by reflective metals, thus creating reflective air spaces. Ask us for a copy—it's free.

Patent applied for.

COST OF INFRA INSTALLED

in new construction between wood joists, material with labor,

Type 6-S; under 9½¢ sq. ft. Type 4-S; under 7½¢ sq. ft.

This year switch to conventionally built-easy to sell Place Homes

for a fast, clean operation with a BIGGER, MORE PROFITABLE FUTURE!

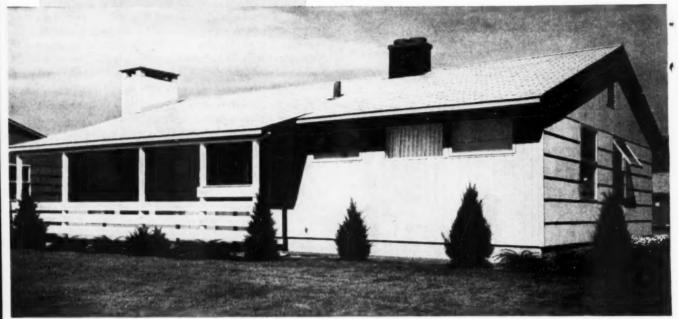


Photo by Hedrich-Blessing

FIVE TESTED FLOOR PLANS - FIFTEEN BEAUTIFUL EXTERIORS!



Photo by Hedrich-Blessing

POSITIVE PROFITS1...EASIER SALES!...MINIMUM INVEN-TORY!...LESS RISK!...CONTEMPORARY PLANNING!... FACTORY TRAINED SERVICE!...FHA and VA APPROVED! Get the jump on your competition—become a Place Homes dealer. Take advantage of Place Home's contemporary architecture! It's paved the way for tetrific sales. Enjoy Place Home's mass buying that assures greater home values and lower inventories for you. Share in the benefits of Place Home's "Trade Secrets" so widely publicized in national magazines. You get all this and more when you build Place Homes under your own name!

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Your local distributor will be glad to show you the Remington Stud Driver in action-on concrete, brick or steel. Find out how you can cut construction costs and speed fastening jobs. For the name of the distributor nearest you and for full information about this modern fastening system, send in the coupon below.

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Approved by Underwriters' Laboratories, Inc.

"If It's Remington—It's Right!"

technical guide

for builders and craftsmen

(Continued from page 206)

appears in sandy or gravelly soil, and the ground water level is below the basement floor, making footing drains unnecessary.

In the chart, drain lines leading to sanitary sewers and septic tanks are grouped together as sanitary drains: drain lines connected to storm sewers, dry wells or open ditches, as storm drains, The proper disposal of drainage water will depend on whether the sanitary and storm drain lines are both low, both high, or one is low and the other is high. Drain lines leading to the sanitary or storm sewer are called low if they are below basement floor.

After a house has been built, any one or all three forms of dampness-leakage, seepage, condensation-may appear in the basement. Leakage and seepage can be reduced or eliminated by the same techniques recommended for new construction; however, most of those

methods entail considerable expense since they require excavation of the earth down to the footing. Interior waterproofing and drain lines, if applied and installed correctly, are effective in all but the worst cases.

Dampness on walls can be controlled by applying several coats of cement-base waterproofing to the inside surface of the basement wall. The waterproofing, which is packaged in dry form and mixed with water to a pancake batter consistency, should be scrubbed into the pores, cracks, and crevices with a bristle brush.

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RECOMMENDATIONS FOR BASEMENT CONSTRUCTION

Extremely Se	evere Condition	s A	verage	Cond	itions		Mild (Conditio	ons		
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Conditions p	event use.	1	3	1	3		Not	required.			
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Connect to st	orm drain,	Disch	arge on			Discharge on splash block of Omit gutter.					
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- 1. Connect to storm drain
- 5. Connect to storm drain if code allows. No laundry or shower discharge permitted in floor drain.
- 6. Connect to sump, then to storm drain if code allows. No laundry or shower discharge permitted,
- Connect to sump, then to storm drain.
 Connect to sump, then to storm drain.
 Required only if underground spring feeds water beneath floor slab. 4. Connect to sump, then to sanitary drain.
- 210

'how to do it' roundup

(Continued from page 89)

application of insulating board siding—

Insulation Siding Institute



Above illustration demonstrates application of overlap joint insulating siding over a wood sheathing, in this case plywood, Sheathing paper should be used between the wood sheathing and siding, and a vapor barrier should be added on the warm sidewall in areas of the country where required. (Exception would be in areas where the established FHA outdoor design temperature for heating is 20 degrees or higher.) Available in two types, square top edge and shiplap, siding panels are nailed top and bottom. Use 10 to 16 nails per panel depending on the size of panel. For wood sheathing, nails should be hot-dipped galvanized, minimum size 11/4 inches-13 gauge, 1/4-inch head. When 5/16-inch plywood is used, nails should be barbed.



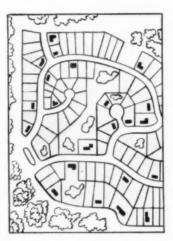


Photo above shows installation of insulating siding over fiber board or gypsum board sheathing. Black painted galvanized or electro-plated copper twist nails are used to secure vertical joints between studs. Nails must be twist clinched (see photo right) on back side of sheathing before inside wall is finished. Use 2½-inch-11½ gauge black painted siding nails or aluminum nails (etched or plain) at studs only.

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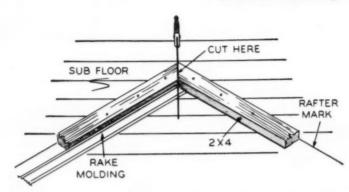
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how would you do it?

ideas for the man on the job

to cut rake moldings-

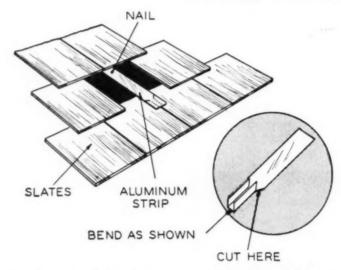


Before the last pair of rafters are raised, they can be used to make a temporary miter box for cutting the gable cuts of rake moldings. Lay out the rafters on the subfloor. Draw a line along one edge of each rafter and then remove rafters.

Tack a 2x4 along each line after

they have been miter cut. The two 2x4's will then form the temporary miter box or jig along which the rake moldings can be placed. The correct top or miter cut for the moldings can then be made.—H. E. Hermanson, Jewell, Iowa

how to repair a slate roof-

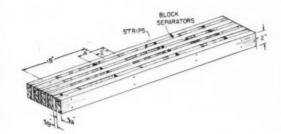


To replace a slate that is missing, take a strip of aluminum one inch wide by about six inches long. Place two diagonal cuts in the strip as shown above. Nail the strip to the exposed surface. Slide the new slate in place, and then bend the

two edges of the aluminum strip where the two diagonal cuts were made. The slate will be held secure in the angle formed by the bent sections of the aluminum strip.— J. E. Kmetzo, Stratford, Conn.

CASH FOR JOB SHORTCUTS—American Builder will pay five dollars (\$5) in cash for each sharkest or job pointer accepted for publication. Send all material to the Architectural Editor, American Builder, 79 W. Monroe St., Chicago 3, III.

how to make a saw table-

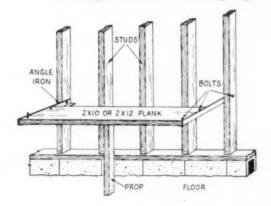


Make a sturdy wooden saw table that lets sawdust and splinters drop through. Use wood strips about $\sqrt[3]{4}$ x2 inches in thickness and as long as you want your table to be. Use the $\sqrt[3]{4}$ -inch edge as the face of the table. Separate these strips with $\sqrt[3]{8}$ -inch plywood blocks about 4 inches long. Space these every 13 inches.—W. W. Howe, Longview, Wash.

save that old flashlight case-

Save that old flashlight case. Use it in your toolbox to hold many of those items like pencils, chalk, soapstone, etc. In this way, you can keep these items within easy reach when you want them and you can keep them from being broken.—A. Tanner Jr., Cold Spring, N. Y.

folding bench for narrow garage-



Take two angle irons of desired length. Bolt them to 2x4's inside the garage so that the angle irons will swing easily. Place them at a height of about 36 inches from the floor. Bolt a 2x10 or 2x12 plank to the angle irons. Use a 34-inch piece or pieces of wood as props to hold the bench when in use. When not in use, bench can drop out of the way.—M. J. Hiland, Lansing, Ill.

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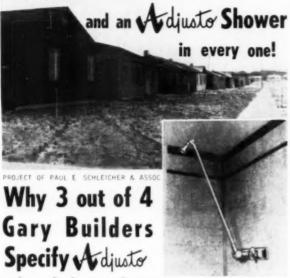
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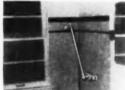
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98 ACRES & HOMES how would you do it?



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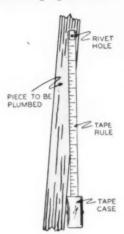
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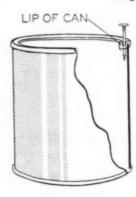
ideas for the man on the job

use a tape plumbob-

An always available. fairly accurate plumbob may be made by using a tape rule. Pull the rule partially out of its case. Place a small nail through the rivet hole. Drive the nail part way into the piece to be plummed. The tape will hang free and its case will act as a plumbob. Merely make the piece to be plumbed parallel with the tape and the piece itself will be plumb .- W. W. Howe, Longview, Wash.



keep your paint can clean!



Drive a nail or screw driver through several places in the lip of the paint can to allow accumulated paint to drip back into the can. This not only will keep the sides of the can comparatively neat and clean, but also assures a perfect seal when the lid is replaced. W. A. Fredricks, New Cuvama, Calif.

how to make a rafter jig-



To make this simple jig for notching rafters, roofing or stairs, drill a couple of holes in the square at the desired pitches. Then drop common wire nails in the applicable holes, and the jig is ready to use. The illustration shows a 6:12 pitch. Other commonly used pitches can also be devised by drilling the holes where you want them.-G. A. Heffelfinger, Lehighton, Penn.



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'Housing . . . U.S.A.' a must for schools, laymen, builders

HOUSING . . . U.S.A., AS IN-DUSTRY LEADERS SEE IT, compiled by 14-man editorial board of authorities in the building field. Simmons-Boardman Publishing Corp., New York; 1954; 224 pages; \$5.00

This timely book has hit the housing market just when it is most needed. Its 22 chapters are loaded with pertinent information which has been correlated by some of the country's most successful builders and housing experts, all of them past presidents of the National Association of Home Builders. However, the contents are presented in language which is as easy for the layman to follow as the professional builder. It tells of the emergence of housing as a modern industry and the concurrent development of today's home builder.

Subjects covered include mortgage credit, the American housing inventory and production capacity, builder research, public relations and merchandising programs, the values of home ownership, urban redevelopment and what is being done to attack the city slum problem.

Also treated are the federal housing agencies, the government's role in housing, cooperative and low-cost housing, public housing programs, building codes, housing and manpower in national emergencies, inflation, taxes and housing in Europe.

This book will fill a much-needed gap in the present limited bibliography of housing, according to NAHB. In addition to general discussions of the subject matter, many figures from governmental and other authoritative sources are included.



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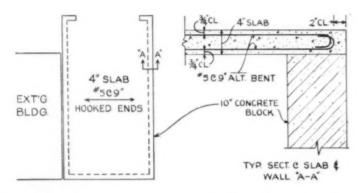
2734 VICTOR STREET • ST. LOUIS 4, MO. OTHER FACTORIES IN FORT WORTH AND BALTIMORE

ask the Wpolls

roof slab for garage

I plan to build a garage which will be attached to my two-story brick veneer home. I plan to build the garage of concrete block and ment rods? What is the best mix to use? Do I need any support for the slab other than the concrete walls? Should I tie the garage and the house together?

E. W. G., Wexford, Penn.



want to place a concrete slab over the garage as a roof. There are, therefore, a number of questions that I would like to ask of you.

How thick should the garage roof slab be? What size and what spacing should I use for reinforce-

Do not tie the house and garage together. Butt the walls to maintain independent action particularly with regard to footings. The footing loads of the present building are

unknown. Here are the recommendations

a problem you haven't solved? Can't solve? Haven't the time to solve?

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As many questions and answers as space permits will be published monthly in American Builder, under the head-"Ask The Experts."

- Planning
- Concrete Work
- Framing
- Roofing
- **Heating and Plumbing**
- Air Conditioning
- Wiring
- Insulation
- Interior Finish
- **Power Equipment**

for the construction of the slab:

1. Use a 1:3:4 mix for the slab. (Use only enough water to make the concrete workable.)

2. Make slab four inches thick. Use #5 reinforcing bars and place them nine inches apart, bending them alternately.

3. No lintel is required over the garage door for support because the roof slab is spanning in that direction.

4. Use six inches of concrete for garage floor slab over fill. No reinforcing bars would be required for the floor.

Wilbur Tuggle, Structural Engineer

do woods change color?

Redwood was used as exterior siding for a house. The siding was finished with oil, was sanded and given two coats of hot linseed oil. The eastern and western exposures are fading. Is there any way of making this finish permanent so it will not fade or darken? A shiny finish, such as varnishing would give, is not wanted.

G. R. S., East Jewett, N. Y.

All woods change in color to some degree when exposed to sunlight. The fading which you have noted on redwood siding coated with oil is a natural change of color produced by sunlight on the wood. It would have occurred even though the two coats of hot linseed oil had not been applied. Later you will note that this fading or change in color will darken more and more and become a pleasing. almost red mahogany color.

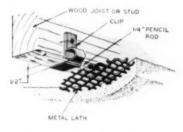
> National Paint, Varnish and Lacquer Association. Inc.

ask the Opports

needs sound deadener

I have a two-story hotel of frame construction. Subfloors are laid over 2x10 joists and the finish floors are oak. What is the best method of insulating against the sound made by guests on the second floor so that guests on the first may not be disturbed?

L. S. E., Livingston Manor, N.Y.



The normal method is to use sound deadening material on top of the subfloor with wood sleepers over it. The finished floor is laid over the sleepers. This method, however, is not most satisfactory.

A plaster ceiling suspended below ceiling joists is a better method, but more expensive than the one above. This is done by using a system of suspended hangers, a stock item used by the U.S. Gypsum Company in its recommended practice for such ceilings. (See illustration.) For this method, clips are attached to joists. The clips suspend beneath the joists and to them is attached metal lath. The surface is then plastered.

One of the greatest problems of deadening sound in floors is that the nails used to secure finished and rough floors to ceiling joists are direct conductors of sound. Until a definite break is made in the construction elements, it is impossible to eliminate the noise.

basement effloresces

When I built my basement three years ago, I did not waterproof it. Last winter was very wet. Efforescence of alkali on the basement walls was the result. What can be done? Will washing the walls with water take the alkali out?

C. E. B., Camas, Mont.

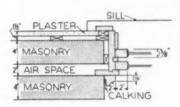
The existing efflorescence can usually be washed away by scrubbing with a 10 per cent solution of muriatic acid and water. Further difficulties may be avoided by liberal application of a good penetrating silicone water repellent.

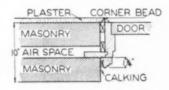
Protection Products Mfg. Co.

window, door frames for cavity walls

I would very much like your advice on details of window sills, jamb or head sections for the framing of the window and door openings in walls of double-wall tile.

J. E. M., St. Paul, Minn.





You, no doubt, have reference to a cavity wall consisting of two four-inch thicknesses of brick or tile with two inches of air space in between. If this is true, then the normal type of door and window frames can be placed in the wall openings without difficulty. In other words, the cavity area would receive the normal windbreak of the double-hung frame. Then a brick mold can be inserted at the intersection of the brick jamb and the windbreak. Placing of the frame would be typical. The same arrangement also applies to doors.



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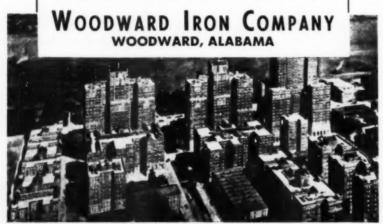


Above: Bouvier Apartments Philadelphia, Pa.



Above: Industrial Trust Building, Providence, R. I. Below: Tudor City— 40th to 44th Streets—New York City

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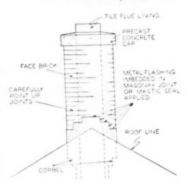


ask the Opports

checking chimney leaks

I have trouble with a leaking chimney particularly after a two- or three-hour rain. The chimney is made of common brick to the roofline and face brick from the roofline up. It is corbeled slightly in the attic. The chimney has been flashed three different times and I have had a cap installed over it, yet it still leaks considerably.

W. A. S., Southfields, N. Y.



About the only advice we can give you (not having seen the chimney) is in the form of recommendations for checking possible trouble spots. The first place to look is at the flashing between the roof-line and the masonry chimney. For example, the mastic seal should be carefully checked. All nail heads should be sealed. Check for ruptured flashing seams and joints which might be caused by either the settling of the house or of the masonry chimney.

Check the brickwork itself. It is highly unlikely that moisture is coming through the face brick themselves; therefore, check the joints between the brick for cracks, If necessary, the joints should be waterproofed. If the joints are in a bad condition, cut them out and tuck point with fresh mortar. Check the chimney cap to be certain that it sheds rain water and, if necessary, the top should be beveled to aid in its shedding of excess moisture. Without first having seen the chimney it is impossible to give more definite corrective measures.

Structural Clay Products Institute

about nails for siding

Are cement-coated nails (dipped in glue) satisfactory for putting on asbestos-cement siding? The siding will be placed on a side of the building subject to driving rains in the winter. My neighbor and I have a difference of opinion. I contend that the glue will wash off in a short time leaving just rusty nail heads. He disagrees. We would appreciate your views on the subject.

R. L. P., Pullman, Wash.

You are correct in your assumption that the cement coating on nails used for attaching exterior siding will disintegrate within a short period of time. Such a nail will have a tendency to rust and stain the asbestos siding. In time, the nail itself will disintegrate.

All of the leading manufacturers of asbestos shingles supply rust-proof nails with their product. These nails are made from solid aluminum, stainless steel or cadmi-um-plated bronze. Few asbestos companies supply a galvanized asbestos siding nail. Of course, a galvanized asbestos nail is much superior to a cement-coated nail in resisting attack by corrosion.

For both the galvanized and the cement-coated nail, the coating on the head of the nail is damaged extensively when the nail is driven. In this way, oxidation of the underlying metal is permitted.

wants information

Where can I obtain a table or slide rule showing roof pitches on all types of roofs, then giving these pitches converted into degrees?

R. P. St. Louis, Mo.

There is a book called "Architectural Graphic Standards" by Charles George Ramsey and Harold Reeve Sleeper containing a wealth of information on roof details of all kinds. It includes a chart of roof slopes in run and rise, pitches and degrees. You can use this as a basis for your computation to determine the various cuts of rafters you may need.

A bibliography of the home building industry, prepared by the NAHB, will be an exclusive feature in the giant AMERICAN BUILDER CATALOG-DIRECTORY out in Aprill





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several proposed labor law changes will affect builders adversely

By John F. McCarthy
Attorney at Law



PRESIDENT EISENHOWER'S labor law proposals include several suggestions to the Congress for liberalization of The National Labor Relations, or Taft-Hartley, Act in favor of labor and at the expense of the building industry. Three of these suggestions are discussed in this article. Builders should study the President's proposals and give their elected representatives in the Congress the benefit of their views for the proper protection of their legitimate interests.

The building industry more than any other has been plagued by the so-called secondary boycott. This usually is a strike or refusal to work with certain goods or materials to force the employer to cease doing business with a particular firm or to cease handling a specific product. This practice, if it affects interstate commerce, is prohibited by the present provisions of the Taft-Hartley Act. These provisions require the National Labor Relations Board (NLRB), where a preliminary investigation shows reasonable grounds to believe that a secondary boycott affecting interstate commerce exists, to obtain an injunction against this practice from the appropriate federal court.

The President proposes that in secondary boycott cases the application by NLRB for an injunction shall be discretionary with that body. He further suggests that the Act be amended to exclude from the concept of a secondary boycott any strike against (1) an employer who is performing "farmed-out" work for another employer whose workers are on strike, or (2) an employer on a construction project who, together with other employers,

is engaged in on-site work.

As we have observed, the building industry has been the particular butt of secondary boycotts. Any liberalization of the law concerning them, as suggested by the President, should be opposed and defeated.

The President has noted that in the amusement, construction and maritime industries, employment often is temporary or intermittent. He therefore recommends that in those fields employers be permitted to enter into so-called prehire agreements with the unions. Whatever may be the merit in the suggestion of the President, it must be accompanied by amendments to the Act regulating the union's prehiring practices. In the construction field some of the greatest abuses occur before any employer-employee relationship is established. For example, a union may refuse to assign any workers, or at least any competent workers, to any employer in getaliation against the employer's alleged grievous conduct.

The present law makes both employers and unions responsible for the acts of their agents. The President recommends that the older traditional common-law rules of agency again be made applicable. Thus inevitably there would arise the problem of whether a specific act originally was authorized or subsequently was ratified. This often presents a difficult problem of proof. The responsibility of unions long has been a problem. Any suggestion such as the present proposal of the President, which makes them less responsible for their members' acts, should be opposed and defeated.

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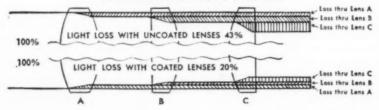


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Donald F. Coenen

Donald F. Coenen joins American Builder as associate editor

Donald F. Coenen, whose editorial experience in the construction field has won him a wide acquaintance-ship among home builders, has joined the staff of American Builder as associate editor.

Until last December 15, he had been affiliated for more than a year with the National Association of Home Builders as editor of its monthly publication, the Correlator, in Washington, D. C. For five years prior to that, he was managing editor of Realty and Building, weekly real estate and construction news magazine published in Chicago.

Early in 1946, Coenen began postwar employment with the Chicago Journal of Commerce, then owner of Realty and Building. He spent five years in the army, rising in rank from private to major, Much time was spent in key Quartermaster Corps posts at Baer Field, Fort Wayne, Indiana. At the end of the war with Japan, he supervised separation processing at this base. He is now an active reserve officer.

A 35-year-old Milwaukeean, Coenen was graduated in 1940 from the School of Journalism at Marquette University. During school days, he served as a Milwaukee Journal copy boy and worked in the university print shop. After graduation he was a reporter for the old Milwaukee Post and engaged in consumer research for the Journal.

Coenen is married and has one daughter, 10. He has just purchased a new home in Chicago's Northwest Side area. His father is a small volume home builder in West Allis, Wisconsin, a Milwaukee suburb.



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Fenestra Windows...

Another builder

speaks his

mind about

Mr. Ferd E. Gast (holding plans) and Mr. A. A. Francis of Gast. Francis & Wilson, well-known Missouri builders, talk Fenestra Ready-Trimmed Casements with Mr. M. F. Holmberg of Sears & Piou, Fenestra Distributors. All pictures are of Mr. Francis' home in the Fieldcrest Development.

Here are the three-light-high Fenestra Casements Mr. Gast praises in the third paragraph of his letter.



We have only this to add . . . the modern streamlined beauty of Fenestra* Steel Windows adds a whale of a lot of sales appeal to your houses. For full information on Fenestra Ready-Trimmed Casements, Screens, Storm Sash, Interior Doors, Sliding Closet Doors and other famous Fenestra Residential Building products (and Fenestra Super, Hot-Dip Galvanizing), see your dealer, call your local Fenestra Representative or write to Detroit Steel Products Company, Dept. AB-3, 2260 East Grand Boulevard, Detroit 11, Michigan.



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No. G-52 making the old a part of the new

Modernization of this structure required floor plan changes, the addition of a new wing, and refacing of the street front. The result is a skillful blending of old and new elements without departing from the original architectural pattern.

The entrance features a wide glass area with stone piers at sides, and an extended circular canopy flush with cornice line above. This canopy is supported by four five-inch round columns of #10-gauge steel tubing.

Doors are surrounded with a molded wood architrave, capped with a broken pediment. The deeply molded profiles of frame, pediment and doors are well adapted to the general character of the entrance detail. Stone planters on each side of the doors complete the entrance assembly.

All glass in windows, circular bays and entrance is set in standard-type steel sash applied to a two-inch channel frame at head and jambs of special openings.

A four-inch steel H column is imbedded three feet into concrete below floor line at entrance door mullions. These columns extend the height of mullions and across the head of opening to provide rigidity for the door frame.



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Detailed by K. Roderick O'Neal, A.I.A. for American Builder

Designed by Sidney C. Finck, Architect; Harold S. Pawlan, Associate

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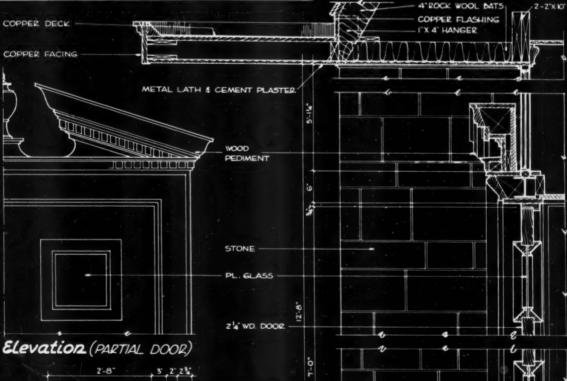


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for SUMMER COOLING

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Professor of Mechanical Engineering University of Illinois

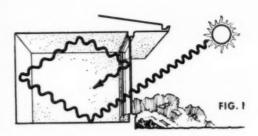


FIGURE 1. A house is a heat trap. Reproduced from University of Illinois Small Homes Council Circular 3.2

PART I

The purpose of this and the next article is to present a few of the more important factors concerning home-cooling devices that are of direct interest to the home builder. What can the builder do to provide a house best adapted to summer cooling? What is possible in the way of a real air conditioning job for the home? What about the average home owner who cannot afford complete mechanical equipment? Perhaps some of these questions can be answered without presenting too many technical details.

The House Should be Protected from Sun

Anyone who has opened up an automobile sitting in the sun has experienced the oven-high temperature within the car. The obvious explanation is that solar energy passed through the car windows was absorbed by the interior furnishings and eventually resulted in heating of the air. In other words, the car was a solar heat trap. To a lesser extent every house is also a solar heat trap; solar energy can pass through windows but the energy in the heated air cannot readily escape to the outdoors. The first lesson that every architect and builder must learn about making homes more comfortable in summer is to shield the house from the sun, especially windows which permit ready one-way passage to solar energy.

An examination of the sources of solar input to a house reveals that the following components need special attention:

- Windows should be shaded, especially those on the east, southeast, southwest and west walls.
- 2. Ceilings should be protected from high temperatures.
- Walls should be protected, especially those on the east, southeast, south, southwest and west sides of the house.

The magnitude of solar energy is much larger than is generally appreciated. For example, a 20-square-foot surface which faces the sun squarely will receive about 6,000 Btu's per hour. In other words, the energy received by the 20-square-foot surface is of the same order of magnitude as the capacity of a small room air

conditioner. Fortunately, the cooling load on a 20square-foot surface of glass, wall or ceiling is not as large as the example might indicate because of the following factors:

- The surfaces of a building do not face the sun squarely, and are usually at an angle with the direct rays.
- 2. Part of the solar energy is reflected from the surface of the wall or window.
- The solar radiation can be blocked before it strikes the building walls or windows.
- 4. The heated air resulting from the absorption of solar radiation can be replaced by ventilation air.

The trick in obtaining a small cooling load consists in utilizing each of these possible methods for reducing the solar energy input to the house.

Reducing Solar Radiation Through Windows

The most vulnerable part of the house as far as summer heat gains are concerned are the windows and glass block walls.

- 1. North windows do not present any problem, even though the sun may shine on them at a low intensity during early morning and late evening hours.
- 2. South windows are relatively easy to handle by means of roof overhangs, as shown in Figure 3,
 - 3. East, southeast, southwest, and west windows are

Simple Method for Determining Overhang Needed on South Wall to Cut Off Summer Sun from Windows and Walls

For Latitude of				
25 degrees North	Overhang		0.37	Height
30	Overhang	-	0.48	Height
35	Overhang	===	0.59	Height
40	Overhang			
45	Overhang		0.85	Height
50	Overhang	_	1.02	Height

EXAMPLE. For latitude of 40 degrees North, height of shadow desired is 6 feet.

Overhang needed is 0.71x6 or 41/4 feet.

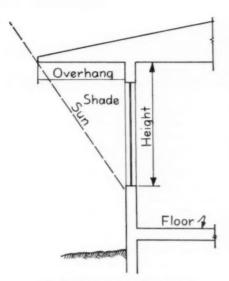


FIGURE 3. Sectional profile of house

difficult to shade completely at all times of the day.

No single solution for shading windows is available for all houses. The following list of shading devices may suggest the treatment to be used for any specific installation:

Method of Shading Windows					educing o Room
1. Shade trees		٧	aria	ble	
2. Louvered walls and fences on					
east and west of building		V	aria	ble	
3. Awnings	65	to	75	per	cent
4. Louver-type insect screens					
a. for sun at low altitudes	25	to	50	per	cent
b. for sun at 20- to 40-degree	5.5	to	75	ner	cent
c. for sun at altitudes greater					
than 40 degrees		78	per	cen	18
Outside Venetian blinds,					
slats at 45 degrees	60	to	70	per	cent
Inside Venetian blinds,					
slats at 45 degrees	15	to	25	per	cent
7. Inside roller shades, fully					
drawn	20	to	35	per	cent
8. Inside roller shades, half					
drawn					cent
Note: Lighter colored shades and than darker colored equipme		are	mo	ore o	effective

Protecting Ceilings from High Temperatures

The roof can serve as a sun shade. The energy of the sun is intercepted by the roof, which will both reflect the radiation as well as absorb it. Obviously the more radiation that is reflected from the roof surface, the less radiation is absorbed by the roof material. The following table gives the ability of various surface finishes to reflect solar radiation:

	Perc	ent	age	of :	Solar
Surface	Rac	liat	ion	Refle	cted
1. Black non-metallic surfaces	5	to	15	per	cent
2. Dark paints (red, brown, green)					
red brick and tile	20	to	35	per	cent
3. Yellow and buff brick and stone	30	10	50	per	cent
4. Whitewash, white paint, light					
cream brick and tile	50	to	70	per	cent
5. Dull brass, copper, or aluminum;					
galvanized steel, polished iron	35	to	60	per	cent
6. Bright aluminum paint, gilt er					
bronze paint	50	to	70	per	cent
7. Polished brass, copper, Monel metal	50	to	70	per	cent
8. Highly polished aluminum, tin					
plate, nickel, chromium	60	to	90	per	cent

In the case of plank-type roof, when solar energy cannot be reflected and will be absorbed as well as transferred to the room below, the use of a reflecting surface finish is recommended. This might consist of light-colored rock chips or gravel, or even a whitewash treatment.

For reasons of appearance or availability of materials, it will not always be possible to use a light-colored or metallic reflecting roof surface. In other words, a fairly large proportion of solar energy will be absorbed by the roof structure. Under certain conditions it is possible to design a roof for either:

1. A pool of water on top of a flat roof. This will require special waterproof treatment of the roof to maintain a depth of water of, say, two inches during the entire summer. The problem of maintaining a supply of water as well as preventing the formation of scum and algae does not make this scheme practical for most home applications.

2. A spray of water on the roof surface. This is more effective in a dry, hot climate. Provisions should be made to dispose of the water that drains off the roof.

Neither scheme is suited for extensive applications to homes, particularly since ordinary roofing materials may not be well adapted to constant soaking with water.

The problem resolves itself, therefore, in permitting a large proportion of solar energy to be absorbed by the roof, but preventing the heat from penetrating through the ceiling. The best way this can be simply accomplished is to ventilate the space between the roof and the ceiling. If the attic cannot be properly vented, the ceiling surface may give a panel heating effect to the room below. Some of the common methods of attic ventilation in use are as follows:

1. Place large screened louvers at both gable ends to

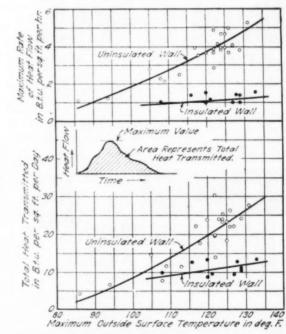


FIGURE 4. Effectiveness of a fully insulated wall in reducing heat gain in summer. (From Univ. of Ill. Eng. Exp. Sta. Bulletin No. 321.) Fully insulated wall reduced heat gain about 50 per cent. compared to uninsulated frame wall

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summer cooling

(Continued from page 227)

permit the passage of air through the attic.

2. Install a continuous soffit ventilator with, say, a two-inch-wide opening, to permit air to enter the attic space at the eaves. The heated air in the attic should then be vented through ridge ventilators, gable louvers, or even a chimney vent.

3. For flat roofs or shed roofs, air should be permitted to enter the ends of the joist spaces above the insulation and travel to the higher end. A slight pitch in a flat roof is desirable to promote this gravity circulation of heated air.

4. Where difficulty is encountered in providing for an exit for the heated attic air, it may be necessary to use mechanical ventilators which will collect the air at a central point and discharge it to the outdoors.

5. In all cases the ventilation air should travel above the ceiling insulation. If the space is properly ventilated and attic temperatures can be kept reasonably low, the heat will not be stored in the insulation to be released at night into the rooms below.

Reducing Heat Flow through the Walls

The amount of heat transfer through the walls of a house will normally not be as large as that through windows and ceilings. Nevertheless, the principle of shading the wall is just as important as in the case of windows. Other means of reducing the heat flow through walls consist of:

1. The use of light-colored paint.

2. The use of roof overhangs on the south to shade wall as well as windows.

3. The use of screened porches on west and east to keep the sun from striking the house walls directly.

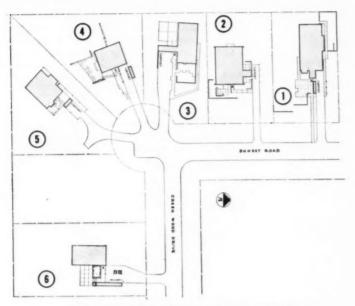
4. The use of adequate insulation to delay the passage of heat as well as to reduce its magnitude.

5. The use of walls with considerable mass, such as a brick veneer wall with an air passage between the bricks and the sheathing.

Considerable emphasis has been given to construction details, since full-scale mechanical refrigeration is relatively costly and should not be considered except for houses that are prepared for it. It does not make sense to allow solar heat to pour into a structure and then install oversized mechanical refrigeration equipment to counteract solar effects. Equipment is available for residential service that will provide a cooling effect the equivalent of 2 tons to 71/2 tons of refrigeration capacity. At current prices in the neighborhood of \$400 per ton of capacity, it will pay the home owner to spend a little more on the house in order to reduce the initial installation cost of the cooling equipment as well as the yearly operating cost,

The current trend towards sprawled-out, one-story, ranch-type homes is contrary to the design principles enumerated for reducing the cooling load. The more spread out the house is, the greater becomes the problem of reducing the heat flow from outdoors to indoors. The most severe problems are those encountered with the ceiling of one-story houses, and the large picture windows that face east or west. In the future, when cooling the home will be as important as heating the house, the builder and architect should give serious consideration to some of the items summarized here.

a proving ground for new ideas— U.S. Gypsum's 6 'Test Tube' Houses



Plot plan showing orientation of the six research houses

The United States Gypsum Company's "Research Village" is a test tube project of six houses to be built in Barrington, Illinois, by the Maxon Construction Company of Chicago. Its objective is to provide project builders of small or medium-sized houses with ideas for more attractive and saleable houses. By duplicating in part or in whole these new ideas, builders around the country should gain a strong selling edge in the competitive market that lies ahead.

Although "Research Village" was conceived and developed by the U.S. Gypsum Company, it actually is being carried out by 12 of the most prominent architectural and builder representatives in the country. This group was divided into six builder-architect teams to achieve the following:

- Contribute new design and construction ideas, particularly for the project home builder.
- (2) Create new uses for building materials.
- (3) Create more livability, comfort, safety, and value for the home owner.

To assure the best results, advisory panels were set up. One consisted of architects L. Morgan Yost, John Root, and Richard Bennett, all of Chicago; another represented the National Association of Home Builders; and the third, the U.S. Gypsum Company.

When the invitation to participate was extended by these panels, 36 architects responded. Six were selected, together with their builder teammates, from as many climatic regions.

The first meeting held by the panel members, the contributing architects and builders concluded that a research village was not only desirable, but it was long overdue. The architects felt that:

(Continued on page 230)

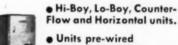
The American Builder will report the month by month progress of the U.S. Gypsum Company Research Village. Two of the six houses have been selected for detailed coverage, concluding with a comprehensive editorial display when the houses are completed.

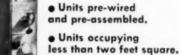


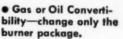
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a proving ground for new ideas

(Continued from page 229)

- (1) Such a project, with each architect from a separate region responsible for the design of one house, would convey in one location the design influence of every region of the country, yet show how design need not be a barrier to construction in one climate area, such as Chicago,
- (2) Since the architects would be designing houses to be built adjacent in the same project, the competitive spirit would motivate the best efforts each could contribute.

The U.S. Gypsum Company exposed their entire line of building materials for the architects' study, although they insisted they were not to be used unless they offered the best possible solution to the architect's problem. Out of this meeting, however, this company already has started several research projects, based on product needs expressed by the architects.

The contemplated plans call for breaking ground in the early spring and having the houses completely

finished by early fall.

The thinking of the builders with regard to the designs and ideas submitted, was expressed by one of the NAHB panel members with: "Gentlemen, these are the kinds of houses we will be building ten years from now."



O'Neil Ford. Architect, San Antonio, Texas

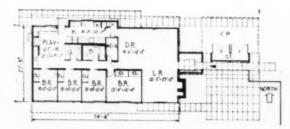




HOUSE NO. 1: Complete design flexibility is possible in this house which has a reinforced concrete roof slab built on the ground and raised into position with hydraulic jacks. This permits outer walls and inside partitions to be non-load bearing



Roof slab is supported by columns independent of the exterior walls. This permits continuous window fenestration in the wall. The cantilevered roof slab makes possible wide overhangs



Plan contains 1.624 square feet of floor area. The bedrooms and play-utility room are grouped around bath and half-bath which are close to the kitchen. The entrance door in the center of side wall divides the living room into two groups, one for conversation, the other for a TV area

HOUSE NO. 2: Advantages of this design, says Jones. are:

"flexibility, high fire resistance, and quick construction." Metal



A. Quincy Jones. Jr., Archt. Los Angeles, California



Joseph Eichler, Builder, Palo Alto, California

roof decking over steel roof trusses are supported by structural columns. Lateral load is carried independent of all partitions



This house features the use of outside patio enclosures for added privacy. Long, low roof over steel joists serves as ceiling. Steel decking is used for fences

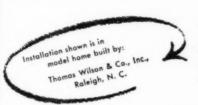


Plan contains 1.395 square feet of floor area and is laid out on a seven foot module. House can be turned in any direction and is designed so carport can be placed on any side (Continued on page 232)

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a proving ground

Harris Armstrong, Archt. Kirkwood. Missouri

Don Drummond, Builder Kansas City. Kansas

HOUSE NO. 3: Plan contains 1,174 square feet of floor area. Privacy, both indoors and out, are offered by careful placing of glass areas. "There really isn't a front to it." says Drummond. "That's what makes it so interesting."

(Continued from page 231)



The extra large patio adjoining the living-dining area adds living space at a minimum cost. Open grille in roof over entrance passage provides extra daylight to living room



Floor plan features a single hallway making all rooms easily accessible. Sales features are a workshop, extra storage in carport, and convertible study sleeping quarters.

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for new ideas



Hugh Stubbins, Jr., Archt. Lexington, Massachusetts



Leonard Frank. Builder. Hempstead. New York

HOUSE NO. 4: The following ideas help sell, according to Leonard Frank: "The bedroom area is separated from service and living; children can go in and out of the recreation room with-



out disturbing any other part of the house." House appears spacious because of sliding wall panels in front bedroom

This house offers a new approach to the split-level arrangement by placing the living and service areas on different levels. Sliding doors of living room provide access to outdoor garden



Plan contains a total of 1.582 square feet of floor area, which includes both levels. The house offers an abundance of living area with the formal portion at grade and recreation area one half flight down. Three bedrooms are located on upper level



Section shows how living, sleeping and dining areas are separated, obtaining maximum usable floor space with split-level (Continued on page 234)

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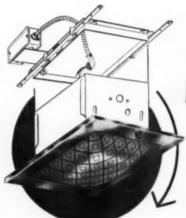
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a proving ground

(Continued from page 233)



Francis Lethbridge, Archt. Washington, D. C.

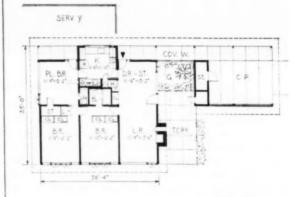


Eli Luria, Builder Arlington, Virginia

HOUSE NO. 5: "Our objectives were to provide some measure of privacy for each member of the family," says the architect. This was achieved by dividing the house into three zones. In this way the master bedroom separates children's area from the living room, and the kitchen is in center point for housewife supervision at all areas



Wide window areas overlook garden and patio. Carport is connected to house by roof which extends over walk, making it an integral part of the house



Plan contains 1.089 square feet of floor area. Rooms are centered around a "mechanical core. which serves both kitchen and baths. Lowered ceiling in bathroom makes the area above available for the installation of an air conditioning unit

for new ideas



Gilbert Coddington, Archt.
Columbus, Ohio

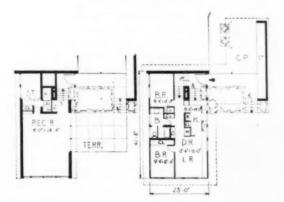


Alex Simms, Builder, Dayton, Ohio

HOUSE NO. 6: "Split level houses will gain in popularity because of the large number of teen-agers who want space for their own activities, which is so easy to obtain with this type of house," says Simms, the builder who co-operated with Coddington in designing this home. Supervision of all activities is easily controlled by the housewife from her position in the kitchen



This split-level house takes full advantage of a sloping lot, featuring a patio on the lower grade, front entrance at the intermediate level, and a kitchen "housewife supervisory" area on the top level. Structural steel frame of basic house is exposed along side walls

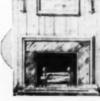


Plan contains about 1.680 square feet of floor area which includes both levels. The area normally used for basement can be effectively used as a recreational room and study—or for an extra bedroom—on grade level. House features a four-passenger compartmented bath



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Austin. Texas, is destined to become this nation's "nerve center' for residential air conditioning.

Here, slender, energetic architectbuilder Ned Cole, as project director, is working tirelessly to lay the foundation for the first co-ordinated



Architect-builder Ned Cole of Austin. project director for 'Research Village"

effort of air conditioning producers and home builders to find answers to residential air conditioning problems.

"I can't publicize too many of the details at this time because we still are in the process of negotiating contracts," said Cole in a recent interview. "However, we are most happy with the unprecedented response of air conditioning producers, home builders and other interested groups."

Sponsored by the National Association of Home Builders, the Austin project, known as "Research Village," was conceived last year in the minds of the nine trustee members of NAHB's Research Institute. In a few short months here is a rundown on the scope and preliminary progress of the Institute's first major. long-range research activity.

Twenty-one manufacturer-home builder teams already have consented to participate in "Research Village," and this is likely to expand to 25. Originally, only 14 houses of varying design and air conditioning equipment were contemplated, but the unexpected interest on the part of air conditioning equipment producers and local Austin builders justified raising our sights. Cole explained.

Purpose of the project is three-

1. Collect technical data for submission to the Federal Housing Administration. Veterans Administration, and other lending agencies, This data should serve as a standard for appraisal of air conditioned houses.

Institute broadens study project

2. Develop construction details necessary for the economical use of air conditioning.

3. Promote greater consumer knowledge and interest in year 'round air conditioning.

Research will proceed in three phases. The first, technical, will be conducted by a mobile laboratory of the National Warm Air Association, in co-operation with the Department of Engineering Research of the University of Texas. The second phase, medical research, and third, psychological, will be conducted by the University of Texas' Medical Department.

Other groups co-operating with NAHB's Research Institute include the U.S. Public Health Service, U.S. Weather Bureau, American Refrigeration Institute, National Mineral Wool Association and Structural Clay Products Institute.

Civic interest in the project has been amazing, said Cole. An Austin developer sold the land for "Research Village" at one-half of its market value. Even though ground has not been broken, 13 of the 21 houses already have been sold, three to builders themselves. The Mayor of Austin will proclaim an Air Conditioning Week.

Cole said traffic in his office had reached such proportion that a more suitable arrangement was necessary. The Austin Home Builders Association responded to the need by building a house adjacent to the project which will be sold by the association after it no longer is needed for project office purposes.

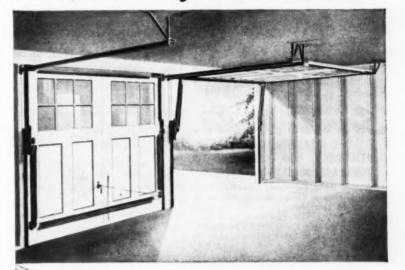
The research project site will be divided into 25 lots, averaging 80 by 120 feet. Since the site is square, houses will face in all four directions.

On the edges of the project, negotiations already are underway between air conditioning manufacturers and builders to erect other houses for additional testing purposes, Cole said. The research site itself is well located, and is adjoined on one side by a beautifully wooded subdivision of high priced houses.

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No. 1251 Standard Control — operates from driveway by switch key.





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Redio Control
—operates from dash control button. Opens and closes doors within 75 feet.

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heating equipment firm sends out road show

The C. A. Dunham Company, Chicago, manufacturer of steam and hot water heating equipment is sending out a super-sized mobile demonstration unit on a year-long nation-wide tour which began in February.

The company's red and black tractor-trailer unit, named "Parade of Products," contains operating and cutaway models of all Dunham steam and hot water heating equipment. The trailer is heated by one of Dunham's gas-fired unit heaters.

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When installing acoustical tile choose a job-designed nail that combines ease of application with these special features: a head end which allows the nail to be driven home without damaging the tiles ...a collar which holds the tiles firmly in place...annular threading which gives superior holding power. The nails are furnished with a plated finish to provent rust streaks where moisture is present. Send for free samples and descriptive literature.



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AMERICAN BUILDER

ask the Oxports

radiant heat under frame flooring?

We are planning our new home and would like to use a floor-type radiant heat, but we also want a basement. We desire wood floors throughout without the necessity of a self-supporting concrete slab.

Could we notch the floor joists and run copper tubing in loops underneath the subfloor? We thought that we could use a reflective-type insulation to keep the biggest percentage of heat in the rooms above and in this way make use of the heat loss into the basement to heat the basement.

How much heat loss?

Would there be enough loss of heat through the copper pipes even though they were not enclosed in concrete? If not, what could be substituted in the place of concrete to transmit the heat from the pipes by conduction to the subfloor above without increasing the expense and too great an additional weight?

We have also considered using 1/4-inch plywood and aluminum foil over the tops of the joists and 1x2 strips between the pipes to carry the main subfloor. What is your recommendation?

J. A. L., Seneca Falls, N. Y.

Installations similar to the one you suggest have been proposed many times. Many heating contractors have given them careful consideration, They have pointed out that there are many problems that would come up if an installation such as you propose were used.

Wood Insulates

Double wood flooring offers relatively high resistance to the transmission of heat. In this respect, wood acts primarily as an insulating material. Therefore, to get and keep a floor surface temperature sufficiently high to satisfy proper heating conditions, experience shows that high temperatures and sometimes excessively high ones would have to be maintained on the underside of the floor. Conventional floor coverings would aggravate the situation and offer greater resist-

(Continued on page 240)

make homes more tempting to buyers—at no extra cost to you!



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... the perfectly engineered system for distributing WARM and COOL air.

ONLY THERMO-BASE provides even heat distribution and up to 20% or more radiant heat at floor level — where it is needed most.

ONLY THERMO-BASE has the Conversion Chamber which converts high velocity pressure to low static pressure, thus providing even distribution along its entire length.

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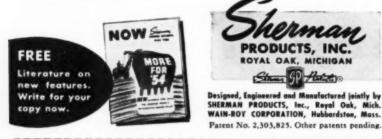
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216

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(Name)	(Title
(Company)	(Street Address)
(City)	(Zone) (State)

ask the Opports

(Continued from page 239) ance to heat transmission.

Floors May Crack

High temperatures must be maintained underneath the wood flooring to assure transmission of heat upward to the room in adequate amounts. This raises the question as to the possible effect on the flooring itself. Wide variations in moisture content of the wood between the on and off heating seasons will inevitably occur, with the likelihood that wide cracks in the finished flooring due to shrinkage will result in the heating season.

Floors May Creak

Passage of the copper tube in loops through the floor joists will be a potential source of creaking noises. A temperature change of 100 degrees Fahrenheit will produce an expansion or contraction of approximately 1/8 inch per ten feet of copper piping run. It can be seen that the temperature variations that will occur between periods when the circulator is operating, or not operating, will cause the tube to shift position with respect to its supports and create noises that will be readily transmitted through the flooring.

Tubing Should Be Embedded

In spite of its high conductivity, the use of copper tubing suspended in the air for the purpose of heat transfer is not recommended because of its low emissivity. Put in other words, copper will do an excellent job of conducting heat from the water within the tube to its outer surface.

The smoothness of its exterior surface, however, gives it very poor radiating qualities. For this reason, copper tube is most efficiently used in any radiant heating system when it is embedded in a dense medium.

Concrete or plaster are dense mediums that will conduct the heat from the copper tube to the surface of the concrete floor slab or plastered ceiling surface which do possess high radiating qualities. This statement is true regardless of the kind of piping material used.

Use a Ceiling Panel

If you want to use wood floors throughout and want to avoid the (Continued on page 241)



Symons Form Hardware for Foundation 24' x 32' Cost 2356

Symons Forms can be erected and stripped faster, are safer, require a minimum amount of waling and bracing, and produce better looking walls.

FORM HARDWARE SUMMARY

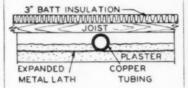
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512	Short Connecting Bolts\$	53.76
32	Long Connecting Bolts	3.52
544	Wedges	35.36
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992	Stop Plates	39.68
8	Inside Corner Brackets	2.80
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4	7' Outside Corners	32.00
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Take advantage of Symons Engineering and Sales Service. Send in the plans for your next job and get complete layout and cost sheet which will show the number of standard panels your job requires, as well as the number and size fillers and corner pieces needed, plus all form hardware necessary. Our Catalog F-9 will also be sent upon request. Symons Clamp & Mfg. Co., 4261 Diversey Avenue, Dept. C4, Chicago 39. Illinois.

ask the Opports

(Continued from page 240)

use of relatively massive concrete floor slabs, we would recommend the use of ceiling panels in which the copper tube is fastened directly



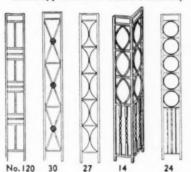
to the ceiling joists. Place expanded metal lath below, but in good contact with the copper tube.

The application of plaster in the normal way to the metal lath will cause it to key through the lath in sufficient amount to partially embed the tube, but to an extent that will permit the property of high thermal conductivity of the copper tube to be fully realized. Three inches of batt insulation above the ceiling will make the reverse heat loss from the panel negligible.

Research Department. Revere Copper and Brass Inc.



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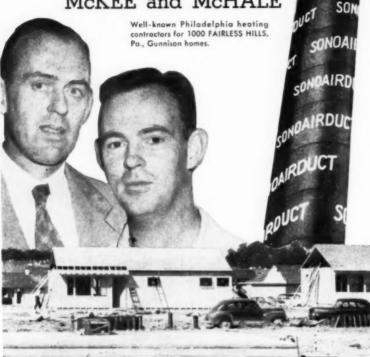
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Sonoco Products Company

lengths on the job.

how to build





Fence combines panels of both wide and narrow grooved fir plywood, applied to redwood frames

This attractive fence for a terrace uses a new building material developed by Western fir plywood manufacturers. Called Texture One-Eleven, the new product is %-inch exterior fir plywood manufactured in panels with 100 per cent waterproof glue. The panels are deeply grooved, and come in two widths. 16 inches (163's-inches over-all) and 32 inches (323/s-inches overall). Grooves in the wider panel are spaced 4 inches o.c. Those in the 16inch width are spaced 2 inches o.c. The panels come in 8-foot and 10foot lengths, and shorter lengths are also available.

This fence uses both sizes, applied to frames built of 2x4 redwood. Post lengths are 8 feet, and the wider frames are 593/4 inches. Two of the 32-inch panels of Texture One-Eleven, with the shiplap ripped off on opposite sides, overhang this width sufficiently to cover the 2x4's of the adjoining narrow sections. thus tying the two sections together. Width of the narrow frames is 273/4 inches. Height of all sections from top to bottom of bottom rail is 64 inches.

The Douglas Fir Plywood Association, Tacoma, Washington, is the sponsor for the development.

a PRIVACY FENCE



Constructing narrow frame. Width is 273/4 inches. Height is 64 inches



Nailing together one of the wide section frames of 2x4 redwood. Width is 5934 in.



Applying narrow panels of Texture One-Eleven to a part of the terrace fence

tile drainage information

"Why Drain Land" is the title of an eight page booklet which describes and illustrates in detail the reasons for tile drainage and underground irrigation. It enumerates the benefits which may be derived from draining land or using a subsoil irrigation system. A list of governmental agencies where financial aid and technical assistance can be obtained is included. Copies of the booklet are available free to drainage contractors upon request to Gar Wood Industries. Inc., Customer Service Dept., Wayne, Mich.



Novafold BAMBOO DOORS and WINDOW DRAPES add beauty—save money

In Novafold you have top-quality, imported bamboo, carefully processed and assembled by American methods. Mildew- and warp-proofed inner-core bamboo is assembled with Seine cord, self-lubricating Nylon slides and specially designed American hardware for long life. After more than 82,000 opening and closing cycles, independent laboratory tests revealed no visible wear or weakening of materials.

Novafold, on straight or curved track, saves space over swinging doors — compresses to 10% of its total expanse. Its ventilated closure permits air to circulate—prevents mildew with slab heating. Novafold Window Drapes screen sun's glare—pass cooling breezes.

Novafold is available in Natural and in nine standard colors; in sizes up to 16' wide, 12' high. Yet Novafold is far less expensive than any other folding door or room divider. Novafold comes complete in every detail—finished in the color you specify—"custom tailored" to your job. The enameled steel track, screwed to the top of the opening, completes the installation in 5 minutes time. There is no floor guide. In new construction—no added cost for furring, trin, roughing or extra bardware.

May we send you illustrated literature and specifications? Please address your inquiry to Dept. 38. Molded Plosiic (lip—locked to bomboo—assures perfect accordion folding.

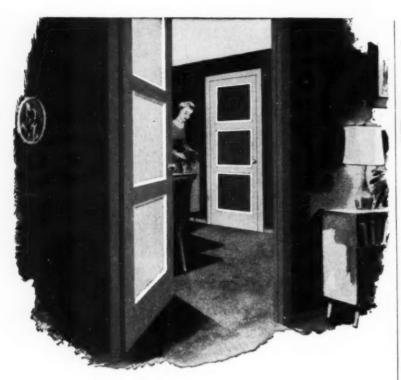






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style...Today's trend toward dramatic use of color and texture provides an important role for panel doors. Newly styled fir panel doors offer refreshing relief from the monotony of flat surfaces. The new wide molding becomes a frame for exciting decorative treatments that add colorful deep-shadow accents—a definite sales feature in any home you build.

dependability . . . Fir panel doors are made to last—a fact attested by over one hundred million installations. When you specify this hallmark FDI* you get doors that are strong, durable, structurally sound; built to meet exacting U. S. Commercial Standards. Fir panel doors won't warp; won't come apart. Cabinet makers working with straight grain, old growth Western fir detail each door meticulously, carefully sand, trim edges square and true. No shortcuts, no shoddy materials—to West Coast fir door craftsmen, dependability is a word with real meaning.



economy... New fir panel doors offer custom features at competitive prices. Compare them for style... compare quality... compare dollar for dollar price—then specify new fir panel doors. Call your regular supplier, or write Fir Door Institute, Tacoma 2, Washington.

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Building front presents a wall of glass;

louvered window wall meets heat and glare problems

The office frontage of the Robertson Square building in the Decorators' Row area of Los Angeles is made of louvered windows which form an integral element of the building's design. The structure faces west, so the architect's problem was to admit light into the building without excess heat.

Robert E. Faxon, AIA, the building's architect, stated that he used these louver-type windows "to solve the problem of afternoon sun and heat, while utilizing the vertical and horizontal rhythms of the six-inch glass strips to add to the beauty of the basic design."

A further advantage of using louvered windows in this building was the simplicity of their installation. There was no need for extensive carpentry and plastering. No multiple window openings were required. The hardware uprights bolt into the narrow vertical girders. Glass louvers were inserted into the uprights, and clips, closed over the edges, secured them. No putty was used.

Easy maintenance and replacement will furnish future economies. Both sides of the glass louvers can be washed from the inside of the building, and in case of accidental breakage, louvers can be replaced from the inside.

Data courtesy Sun-Sash Co.



Close-up of building front; open louvers provide floor-to-ceiling ventilation

TRADE-INS

are good for higher price market

Rollin E. Meyer & Son, builders and developers in the San Francisco area, think that the market for houses in the higher price bracket has not been exploited, and that the way to do it is to use trade-in selling. Meyer outlines the following case history of a recent new house sale through trade-in. which illustrates the method:

The new house built by Meyer was priced at \$65,000 and was sold to a family which had a home in another area, which Meyer took in for \$40,000. Before doing so, however,

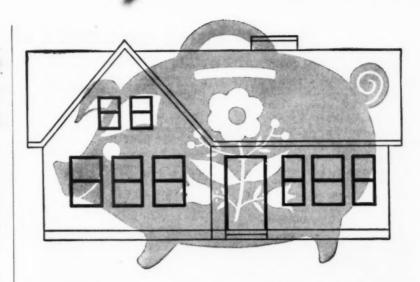


Trading in old house for a new contem porary model is part of selling campaign by Rollin E. Meyer & Son for their tract near Hillsborough. California, featuring houses at \$37,500 and up

Meyer called several realtors who specialized in property in that area. Combining his own appraisals with those of the brokers, it was decided that the old house would sell quickly at between \$36,000 and \$39,500. "Analyzing their appraisals and knowing our maximum allowable margin for the trade, we were able to give the owner the \$40,000,"

Now the purchaser of the \$40,000 house moved from a house on which Meyer allowed \$19,000 toward the purchase of the first house in trade. This amount was based on appraisals from competent brokers familiar with the area, and upon close study of the sales and listings within the same block, through the multiple listing service.

"The second house ultimately sold for \$20,000, thus allowing us to realize our intended profit on our new house."



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The metal weatherstrip that is installed should depend mainly on two factors: reputation of the product and reputation of the manufacturer. Members of the Weatherstrip
Research Institute possess both—a reputable product, and all are reputable, long established companies. Remember these facts when considering metal weatherstrip for the homes you build.

WEATHERSTRIP Research INSTITUTE

OFFICE OF THE SECRETARY BOX 101, RIVERSIDE, ILLINOIS

For complete facts on the economic value of weatherstrip, send for Bulletin No. 35-"Air Infiltration Through Weatherstripped and Non-Weatherstripped Windows," published by the University of Minnesota Institute of Technology-no charge or obligation.

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how to install terne metal chimney flashing

One of the most critical spots in the construction of a roof is the chimney flashing. This point is especially vital when a chimney straddles both slopes of a roof.

Continuous flashing of terne metal can be installed on such a chimney, avoiding stepdowns and eliminating most of the seams.

After the roofing pans have been turned up to form the base flashing around the chimney, and the corners closed off with corner patches. the roofer uses a quarter-inch grinding wheel in an electric drill to cut a half-inch groove at a point $4\frac{1}{4}$ inches above the roof line.

The cap flashing is then fashioned to go all around the chimney. It is cut and bent to fit into the groove in the brick, stone or block of which the chimney is made. When the cap flashing has been inserted, it is wedged into place by driving masonry nails into groove above it.

The finished flashing is caulked

with some suitable compound, giving a flexible, weatherproof flashing that considerably enhances the appearance of the house.



Using grinding wheel, roofer cuts a 1/2-inch groove, 41/4 inches above roof line



Cap flashing is cut and bent all around chimney to fit into the groove in masonry



Flashing is wedged into place by driving masonry nails into groove above flashing



Finished flashing is caulked with compound, giving flexible, waterproof finish

Courtesy of Follansbee Steel Corp.

AN INDUSTRY FIRST! A bibliography of the home building industry will appear for the first time in any publication in American Builder's 1954 Catalog-Directory issue—out in April. Don't miss it!



blinds, custom-made to your specifications, fill the bill for every type of installation. Pioneered by Eastern and manufactured with Eastern equipment and processes by local manufacturers everywhere, Rolla-Head is quality controlled from precision-built tilting gear to streamlined tape clips.

Ideal for commercial installations because of initial low cost plus lowest possible maintenance cost (spap-in bardware can

cost plus lowest possible maintenance cost (snap-in hardware can be replaced without use of tools). For complete data see Eastern's 16-page catalog in the 1954 Sweet's File. For complete satisfaction . . . specify Rolla-Head.

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NAHB plaque awarded homemakers' magazine

The President's Plaque "for distinguished reporting of home building news in 1953 by consumer magazines" was presented by retiring NAHB President Emanuel M. Spiegel to "Living for Young Homemakers." Mrs. Edith Brazwell Evans, editor of the publication, received the award at a general session of the 1954 NAHB convention in the Hilton grand ballroom.

The occasion marked the first time that NAHB had so honored a consumer publication. Members of



NAHB's first President's Plaque to a consumer magazine for distinguished reporting of housing achievements is presented by its retiring leader. Emanuel M. Spiegel, to Edith Brazwell Evans, editor of "Living for Young Homemakers"

a public relations committee headed by Leslie Hill acted as judges.

During the past year, "Living for Young Homemakers" selected several homes it felt were well constructed, well designed and well priced, and assigned its staff decorators to color scheme and decorate them to enhance their features. Among them were seven houses in Columbus, Ohio: four in Tyler, Texas: three in Houston, and individual homes in Los Angeles, Minneapolis, Milwaukee, Dayton, Chicago, Louisville, Lafayette, Indiana: Racine, Wisconsin: Schenectady. New York: Brookville, Ohio, and Jackson, Mississippi. Reports from the builders benefiting from the service indicated their homes became more saleable and reported a substantial volume of sales.

"It's easier to sell houses from the floor up!"

of Higgins Block



The Robert P. Gerholz houses in Flint, Michigan, have gained national attention because of their up-to-the-minute design. Right from the first, these houses have featured the up-to-the-minute flooring, Higgins Block. Besides the lustrous, sales-making richness of texture, look at all the other advantages of this flooring:

- 9"x 9" net face hardwood blocks —easy to install
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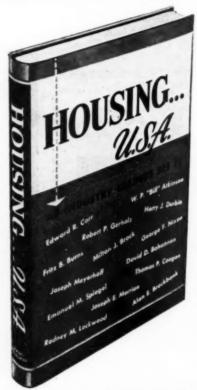
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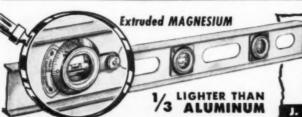
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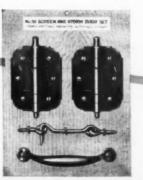
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